

# East Whatcom Food Landscape Assessment

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A Comprehensive Snapshot of Food Access in East County

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Whatcom County  
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## Acknowledgments

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This report was advised by Astrid Newell, MD, Community Health Manager and Ali Jensen, MPH, Program Specialist, at the Whatcom County Health Department. Taylor Lewis, AmeriCorps Vista member with the Health Department also assisted with NEMS survey data collection. In addition to the Healthy Communities Team, this assessment includes Mt. Baker School district data because of the diligent and hardworking Health Information and Assessment (HIA) team at the Health Department. I appreciate your work, willingness to talk through data challenges, and support of this assessment.

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# Executive Summary

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## Background

The objective of this assessment is to examine food security and food access for East Whatcom County residents using both qualitative and quantitative methods.

The primary questions this assessment answers are:

1. What are the characteristics and demographics of people who live in East Whatcom County?
2. What food is accessible to residents, how healthy is it, and how affordable is it?
3. Where are residents currently choosing to purchase food, and why?
4. What is the feasibility and realistic use of a grocery retailer opening in East Whatcom County?

## Methodology

This assessment is comprised of four main strategies and data sources:

1. Nutrition Environment Measures Survey (NEMS)
2. East Whatcom County Community Survey
3. East Whatcom County Focus Groups
4. School District, Census, and American Community Survey data

The Foothills Community Food Partnership (FCFP) Steering Committee, a team comprised of six community members and stakeholders, provided support and feedback in the design and implementation of the Assessment.

## Key Findings/ Major Themes

**East Whatcom County has higher proportions of populations that are vulnerable to food insecurity.**

- *Over 50% of Mt. Baker School District students were eligible for free and reduced lunches in the 2016-2017 school year, the highest proportion being at Kendall Elementary where 73% of students were eligible.*
- *11.2% of the population are veterans and 15.6% of people report living with a disability.*

**East Whatcom County is a food desert and residents struggle to access healthy, affordable food.**

- *East Whatcom County qualifies as a rural food desert, based on the United States Department of Agriculture definition of “low access” where at least 500 people and/or at least 33 percent of the census tract population resides more than ten miles from a supermarket or large grocery store, and are “low income,” where at least 20% of the population is at or below federal poverty level.*

- *Out of 302 community survey respondents, 75% said that food was not accessible, convenient, and affordable in their community and 61% said that they or their neighbors struggle to access healthy, affordable food.*
- *Focus group participants identified many barriers to accessing healthy, affordable food including transportation, lack of selection at local stores, higher local prices, and cumbersome county regulations preventing store expansion.*
- *Produce and other healthy items are available at East County convenience stores, however selection is limited and prices are higher than stores in Bellingham.*
- *While bus routes do exist, service is limited (especially on weekends) and leaves out some communities (Acme, Maple Falls, Glacier).*

**Many residents currently shop in Bellingham, but there is evidence for community support of a local retailer.**

- *Most community survey respondents (84%) listed Bellingham as one of the top three locations they currently shop, but only 42% stated they would prefer to continue shopping in Bellingham if they had other, closer options.*
- *Residents prefer stores that offer affordable food and have a greater selection of food to meet their dietary and/or cultural needs.*
- *80% of survey respondents said they would shop at a new retail development in East County.*
- *Focus group participants identified the desire to support local retailers and farms.*

**Residents are interested in support for new retail development in the region.**

- *Focus group participants identified the county permitting system and other regulations as barriers to opening a new store or growing current retail.*
- *In both the focus groups and community survey, residents identified a need for other services in addition to a grocery store such as a pharmacy and medical clinic.*

## Introduction

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In 2013, Lina Pinero Walkinshaw, an MPH student at the University Of Washington School Of Public Health, conducted an East Whatcom County Food Landscape Assessment with the Whatcom County Health Department (WCHD) and the Foothills Community Food Partnership Steering Committee.<sup>1</sup> The 2013 Assessment was a comprehensive look at food access in East Whatcom County and built on the 2011 Whatcom County Community Food Landscape Assessment (CFA) and the 2013 CFA update. This current Assessment is an update on the food landscape in East Whatcom County, community responses to the recommendations brought forth in the 2013 Assessment, and a current view of resident preferences and insights into food access and availability in their community.

East Whatcom County (also known as “The Foothills”), has changed significantly since the 2013 Assessment. Several stores have closed their doors while the population continues to rise. This current Assessment was developed by Health Department Staff (Ali Jensen and Aly Robinson) to understand more about the impact of these changes on community health. The Foothills Community Food Partnership (FCFP) Steering Committee partnered with the Health Department in this effort. The FCFP’s purpose is to mobilize the community around a common vision of *“a community in which Foothills residents are fed, nourished, and have the resources to access the food they need.”*<sup>2</sup>

The East Whatcom Food Landscape Assessment is comprised of four main strategies and data sources: 1. The Nutrition Environment Measures Survey, 2. An East Whatcom County Community Survey, 3. Focus groups held throughout East County, and 4. Census and American Community Survey Data. These data sources and research strategies were chosen based on their usage in the 2013 East Whatcom County Food Landscape Assessment and their ability to inform the learning objectives of the FCFP and the WCHD.

The geographical scope of this Assessment corresponds with three major designations, with minor variations. See Appendix A-C for visuals.

1. US Census Tract 101
2. The Mt. Baker School District Catchment Area
3. The East Whatcom Regional Resource Center Service Boundaries

Focus still remains on the East County Census Designated Places (CDPs), the economic and population hubs of East County. Throughout this assessment, the term “Foothills” will be used interchangeably with “East Whatcom.”

This report is intended to inform the WCHD, FCFP, and community members of food access and food security in the Foothills. It will be used in the planning and preparation for a Foothills Food Summit in the Fall of 2019 and will inform potential retailers of the desires and concerns of local residents for grocery retail.

After the 2013 Assessment was completed, the FCFP convened the Foothills Food Summit to launch a community planning process. The input from the Summit laid the foundation of the Foothills Food Access Plan, which can be viewed online [here](#).

## Literature Review

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The objective of this literature review is to provide background information on food deserts and assessment methodologies that have been used in previous studies. This review builds on the 2013 literature review conducted by Lina Walkinshaw for the 2013 East Whatcom Food Landscape Assessment.<sup>1</sup>

### *Food Desert Identification*

In 2009, the United States Department of Agriculture proposed a framework where multiple factors contribute to an individual's food choices; including social, economic, access, and environmental factors.<sup>3</sup> *Food deserts* are defined as low income geographic areas (census tract, zip code) with low access to supermarkets. In a rural area, low access to a supermarket has been defined as either more than 10 miles or 20 miles from large grocery retail.<sup>4</sup>

### *Food Deserts and Health*

The term food landscape encompasses all food stores, prepared food retailers (such as restaurants and coffee shops), and farm stands in an area. For this report, the focus is primarily on food stores. The built environment, including physical grocery stores and transportation infrastructure, is a contributor to dietary-related health disparities.<sup>3</sup> Health disparities exist along the rural-urban divide as well. There is a gap between rural and urban communities and health outcomes, as rural communities have higher age-adjusted mortality rates than urban areas.<sup>5</sup> Rural residents also have lower income than urban residents, an indicator of poorer health outcomes.<sup>6,7</sup>

In a study focusing on diet quality trends from 1999-2010, lower income individuals consumed lower quality foods than higher income individuals, as measured by the Alternate Healthy Eating Index.<sup>8</sup> This trend is also true with participants of the Supplemental Nutrition Assistance Program (SNAP). SNAP participants had lower overall dietary quality and intake of whole grains, and more intake of red meat, potatoes, and fruit juice compared to nonparticipants, in a study from 1999-2008.<sup>9</sup> Many studies have associated living in an area without access to a grocery store or healthy food outlets with poorer dietary intake,<sup>10-12</sup> as well as poorer health outcomes related to diet, such as type 2 diabetes and obesity.<sup>13-16</sup> Overall, there are disparities along socioeconomic and racial/ethnic lines that contribute to consumption of healthy foods.<sup>17</sup>

### *Assessing the Rural Food Environment: Methodology*

The Nutrition Environment Measures Survey (NEMS) was developed in 2007 by Karen Glanz to assess the food environment through a universal observational tool.<sup>18</sup> This well-established tool continues to be used

throughout the world to assess the nutrition environment.<sup>19</sup> The NEMS survey has been adapted by researchers to be used as needed, such as the adaptation done for the assessment in 2013<sup>1</sup>, as well as for assessing restaurants,<sup>20</sup> Tribal convenience stores,<sup>21</sup> and many more. In addition to the NEMS survey, spatial analysis has also been used to assess the nutrition environment and distance to food stores.<sup>21</sup> Perceptions and insight from communities living in food deserts or experiencing food insecurity and mixed-methods approaches to research have become more commonplace in food environment research<sup>22,23</sup> since the 2013 literature review presented by Walkinshaw.<sup>24-26</sup>

### *Dimensions of Food Access*

Block and Subramanian (2015) propose a comprehensive approach to the dimensions of food access.<sup>17,27</sup> In addition to availability, accessibility/convenience, and affordability, *accommodation* and *acceptability* were also included as dimensions of healthy food access. Accommodation refers to “how well food sources adapt to residents’ needs (store hours, types of payment accepted, offerings of culturally relevant food items”<sup>14</sup> and *acceptability* refers to “people’s attitudes about attributes of their local food environment, and whether or not the given supply of products meets their personal standards.”<sup>17</sup> These additional dimensions are important to understanding how the food environment impacts diet.

While the built environment has a significant impact on food access, studies show that new stores in food deserts are not associated with significant changes in improved diet quality or body mass index (BMI).<sup>28,29</sup> Two studies found an association between the opening of a new grocery store and improved diet, but they were not able to link the diet change with the new store.<sup>30,31</sup> However, a study from 2014 found that the opening of a supermarket in a food desert increased consumer perceptions of healthy food access.<sup>30</sup> Another recent study evaluated the impact of a non-profit grocery store on the food environment and resident store choice in Chester, Philadelphia. The study found that while 63% of survey respondents did not shop at the new market, the residents surveyed who did shop at the market identified greater convenience, affordability, and selection of food in their community.<sup>33</sup> A recent study in Seattle found that proximity to supermarkets is not associated with diet quality and healthy food consumption.<sup>34</sup> While physical access to stores is important, it does little to increase healthy food consumption or health outcomes related to poor diets in food desert communities. The opportunities for food retail investment in low-income communities may improve resident’s economic well-being.<sup>35</sup> For example, a grocery retailer could provide local job opportunities, improve access to healthy foods, and open up more opportunities for retail investment in rural, commercial areas. The study from Chester, Philadelphia also found that the new market increased community social connection and had a positive community impact.<sup>33</sup> It is important to think more broadly about the opportunities that a food retailer could provide a rural community, such as decreased transportation costs, economic growth, improved quality of life, greater selection of food, convenience, and opportunities for social connections.



## Methodology

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The East Whatcom Food Landscape Assessment is comprised of four main strategies and data sources. Each strategy was selected for a few main reasons. The Nutrition Environment Measures Survey is used to provide a comprehensive snapshot of what food is currently accessible and how healthy and affordable it is. The NEMS survey is a widely used tool to assess the food landscape and an adapted version was used in the 2013 East County Food Landscape Assessment. Using the same adapted NEMS assessment allows for comparison over time with a consistent measurement tool. An East Whatcom County Community Survey provides insight to community shopping norms and preferences and resident priorities for food store selection. A survey was selected because both online and paper transmission methods could be used to broaden scope of distribution, an important consideration for the rural communities in East County. Focus groups held throughout East County strive to answer the question of realistic use of grocery retail in East County and resident barriers to accessing affordable, healthy food. Census and American Community Survey Data is used to show who lives in East County and the demographic and social composition of the region.

Because this data is not generalizable and will be solely used to improve and increase food retailer services in East Whatcom County, it does not qualify as research and therefore no human subjects or IRB approval was necessary. The University of Washington Human Subjects Division was consulted and this was confirmed.

### Mapping of East County Food Retailers

Mapping of food stores is essential to understand resident's physical distance to food and the distribution of these food stores throughout East County. East County food retailers were selected based on the 2013 assessment as well as ground-truthing and community input. Two retailers outside of East County were included based on their use in the previous assessment as well as being highly utilized by East County residents as identified by the community survey. Latitudinal and longitudinal coordinates were used to map the locations of retailers.

Three East County Farm Stands were also included in the assessment map.

### Nutrition Environment Measures Survey

For this assessment, the adapted NEMS-S survey and scoring guide were used. These tools were adapted in 2013 for the first assessment. In addition to the original NEMS-S survey, cheese, pasta, frozen and canned fruit and vegetables were added. Lena Walkinshaw and the research team for the 2013 assessment chose to include these additional measures based on their use in the USDA Thrifty Foods menu and market basket price assessments.

### **Scoring**

The scoring guide developed for the 2013 assessment was used to maintain consistency and provide for the possibility of comparison over time. This East Whatcom County NEMS survey adaptation has 13 measures and 69 total potential points. In addition, the built environment measure was included to maintain consistency with the 2013 assessment and determine if there have been any major changes since 2013. The built environment score was excluded from the NEMS-S score, staying consistent with the previous assessment.

Stores receive scores based on the availability and price of the products offered. For produce, the scoring is based on availability and quality. For example, if low fat milk is available, the store receives two points. If the price for the lower fat option (low fat milk vs. whole or 2%, for this example) is lower than the higher fat option, the store receives an additional 2 points. If all milk is priced the same, the store received 1 point. The prices used in this assessment were the prices that were marked on shelves. If no price was seen, an associate was consulted to price the item. Quality scores were based on the percent of acceptable produce ratings out of the total varieties available.

### **Surveying Stores**

Stores were selected based on their location within the identified East County region. In total, 7 convenience stores were surveyed within East County. Two grocery stores were surveyed, both outside of the EWRRC service boundary. The two grocery stores were selected based on their proximity to East County and their identified use by residents from the community survey. To gain permission to survey stores we spoke with the store manager or representative at each store, told them about the survey and assessment, and provided a letter and the NEMS assessment if requested.

### **Anonymity**

At the request of store managers, store names will be kept anonymous for this report. For data visualization purposes, stores were renamed with “Conv-A-F” and “Grocery-A-B.” This will still allow us to compare grocery stores and convenience stores while keeping the name and location of those stores anonymous in the reporting and comparison visuals. In the community survey results section stores will be named. These stores are where residents identified getting groceries frequently. They are not necessarily the stores that were surveyed.

### **East County Community Survey**

The Community Survey provides insight into resident’s shopping preferences and opportunities for and support of a local grocer. Residents were also asked to specifically identify stores they most commonly get their groceries. The stores identified may be different than the stores surveyed for the NEMS, as many residents get groceries outside of East County. Surveys were offered in paper and online forms and were translated into Russian, Ukrainian and Spanish.

Outreach was conducted at the food bank and community meetings primarily in the Kendall/Columbia Valley area. Surveys were available online as a Google form and open to the public. Paper surveys were located at the Deming and North Fork Whatcom County Library locations, the East Whatcom Regional Resource Center, and on my person. Online survey links were shared via several local monthly newsletters and listservs, on the neighborhood website NextDoor (Maple Falls only due to access), and shared both in person and online by community leaders. Nineteen residents completed the survey at the East Whatcom Fall Fair at the EWRRRC and 21 residents completed the survey at the Foothills Food Bank (13 in English, 3 in Russian, 2 in Ukrainian, and 3 in Spanish). In total, there were 9 survey responses in a language other than English.

The Community Survey was tested with the FCFP and suggested changes were made. All paper surveys were manually entered into the google form survey by the same person to ensure consistency.

There were 302 responses to the Community Survey. Respondents lived throughout East County, however the majority (53%) of respondents lived in the Columbia Valley region.

## Focus Groups

Two Focus Groups were held to further assess the implications of food access in the Foothills. Focus groups were held in late January to early February of 2019. Flyers and invitations were shared with those interested and through similar communication channels as the Community Survey. One Focus Group was held at the Deming Library (3 participants) and the other at the East Whatcom Regional Resource Center (7 participants). Focus Group attendees received a \$15 visa gift card for their participation. Translation services were offered but none were requested.

Focus Groups were transcribed using Descript transcription software and manually edited for errors. Transcriptions were coded for emergent themes using Atlas.ti qualitative data software. The research team collaborated to develop codes and themes. Once transcribed, all audio recordings were deleted. Transcription reports did not include identification of participants.

## Census and ACS Data

Social, economic, and demographic data was collected from the 2012-2016 American Community Survey 5-year Data Profiles. All data collected is publicly available on the American Community Survey website. Due to small sample sizes and large margins of error for the 2012-2016 ACS data throughout East County, much of the demographic information shared is at the school-district level. The Whatcom County Community Health Assessment and Mt. Baker Community Health Snapshot reports were also used. These reports are created by the Whatcom County Health Department to share the health of our county and at a sub-county (school district) level. These reports are also publicly available on the WCHD website.

## Data Visualizations

A primary goal of the report is to provide easily understood data visualizations. Tableau Desktop 2018.3 was used for all data visualizations for this report. Data have been saved as workbooks and will be accessible to health department staff to be used in the future. Another goal is to allow this report to be broken down and used as smaller documents for the FCFP and/or community to use in seeking grants or additional services as needed. This report will be used in the planning and facilitation of a Foothills Food Access Summit in Fall of 2019.

## Definitions

**East County:** For this assessment, East County is defined as the East Whatcom Regional Resource Center boundary. The terms “East Whatcom”, “East County”, and “The Foothills” will be used interchangeably throughout this assessment.

**Grocery Stores:** Also called “supermarket” and “full service grocery store” for this report. These stores stock a wider variety of foods than convenience stores, are larger in size and have regular hours (8am-8pm).

**Convenience Stores:** A combined definition of Traditional Convenience Stores and Limited Selection Neighborhood/Convenience Stores will be used for this report because we see both in the food landscape in East Whatcom. Convenience stores generally offer less products than grocery stores, are affiliated with gas stations, and have extended hours.<sup>33</sup>

**Traditional Convenience Store:** These stores are generally between 2,400-2,500 square feet and carry an array of products including dairy, bakery, snack foods, tobacco, grocery items, healthy and beauty aids, and potentially some prepared food to go.<sup>33</sup>

**Limited Service Convenience Store:** Generally range from 1,500-2,000 square feet and offer a more limited product mix than traditional convenience stores and are often affiliated with a gas station but both gas and store patrons are important to overall sales.<sup>33</sup>

**Food Desert:** a defined census tract that has both low access to healthy affordable food and is low income.

**WCHD:** Whatcom County Health Department.

**FCFP:** [Foothills Community Food Partnership](#). This is a large collaborative of interested parties addressing food insecurity and access in the East County Foothills. The Steering Committee is comprised of local leaders from multiple sectors invested in mobilizing the community around a common vision of food access and security.

**CDP:** Census Designated Places.

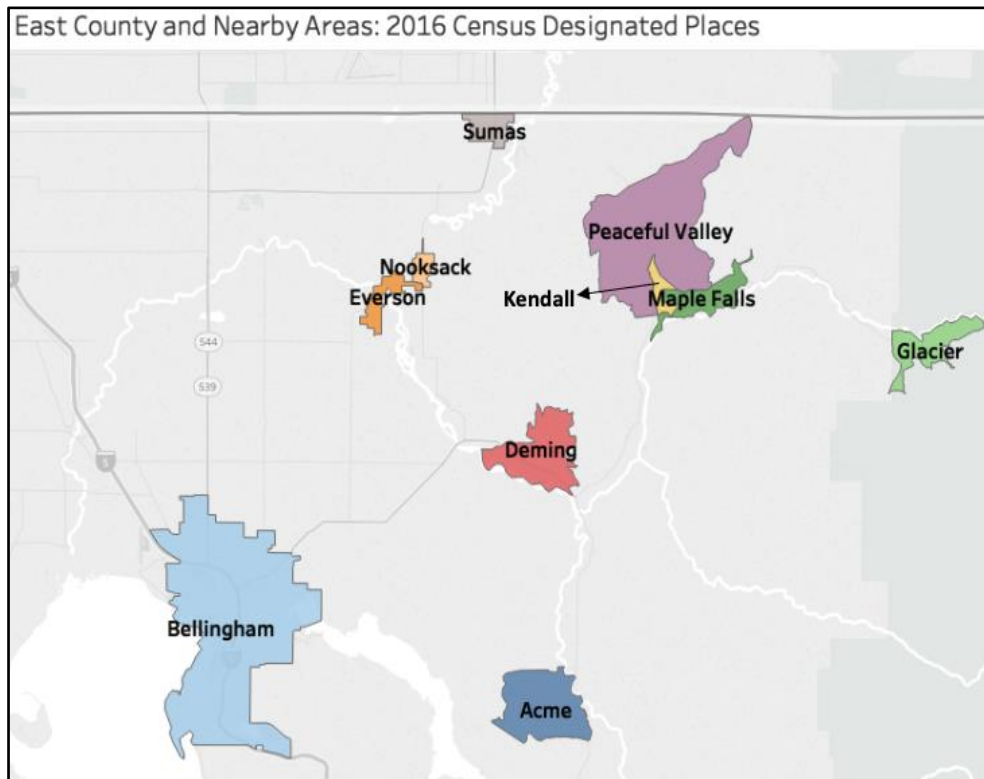
# Findings

## Background Data: East Whatcom County

### Population Profile

U.S. Census data, in addition to school district-wide data, was used in this report to gain a better understanding of the population centers in East County. The census-designated places (CDPs) were used to get a better understanding of the small population hubs in East County. Due to small populations and large margins of error, Mt. Baker School District wide data was used for the majority of the data.

The East County CDPs include Peaceful Valley, Kendall, Maple Falls, Glacier, Deming, and Acme. Everson, Sumas and Nooksack are on this map as they are the closest incorporated areas to the East County CDPs and where some residents identified accessing services.



### Demographics

The below tables are from the Whatcom County Health Department's Community Health Snapshot Report for the Mount Baker School District<sup>34</sup> and illustrate the demographic makeup of the Mt. Baker School District and Whatcom County as a whole.

Population, 2012-2016	Mt. Baker	Whatcom County
Total Population	15,089	209,729
Acme CDP	162	
Deming	246	
Glacier	80	
Kendall	133	
Maple Falls	55	
Peaceful Valley	3,503	

All of the Mt. Baker School District Census Designated Places (CDPs) are in unincorporated Whatcom County. This means that there are no local municipalities within this district. Peaceful Valley has the largest population of all of East County's CDPs and is the home to Columbia Valley Urban Growth Area (UGA). The majority (over 10,000) of Mt. Baker School District residents live outside of any CDP in unincorporated Whatcom County.

The median age of Mt. Baker School District Residents is older than Whatcom County as a whole. There are a higher percentage of 45-64 year olds living in this region than in all of Whatcom County and slightly more males than females.

Age Distribution, 2012-2016	Mt. Baker	Whatcom County
Median Age	42.7	36.8
Under 5 years	5.2%	5.5%
5 to 14 years	11.5%	11.1%
15 to 24 years	11.5%	18.2%
25 to 44 years	23.1%	24.5%
45 to 64 years	33.3%	25.5%
65+	12.7%	15.5%

The Mt. Baker School District is primarily comprised of White/Caucasian residents. Spanish, Hispanic, or Latino Ethnicity was the second largest population in the area. There is also a higher percentage of American Indian/Alaska Native residents than Whatcom County. This is primarily due to the location of the Nooksack Tribe.

Gender, 2012-2016	Mt. Baker	Whatcom County
Female	49.0%	50.5%
Male	51.0%	49.5%

Race and Ethnicity	Mt. Baker, 2012-2016	Whatcom County
African American/Black	0.3%	0.9%
American Indian/Alaska Native	3.3%	2.7%
Asian	1.6%	4.0%
Native Hawaiian/Pacific Islander	0.2%	0.3%
White/Caucasian	84.8%	80.1%
Spanish, Hispanic, or Latino Ethnicity (any race)	7.2%	8.8%
Two or more races	2.4%	3.0%

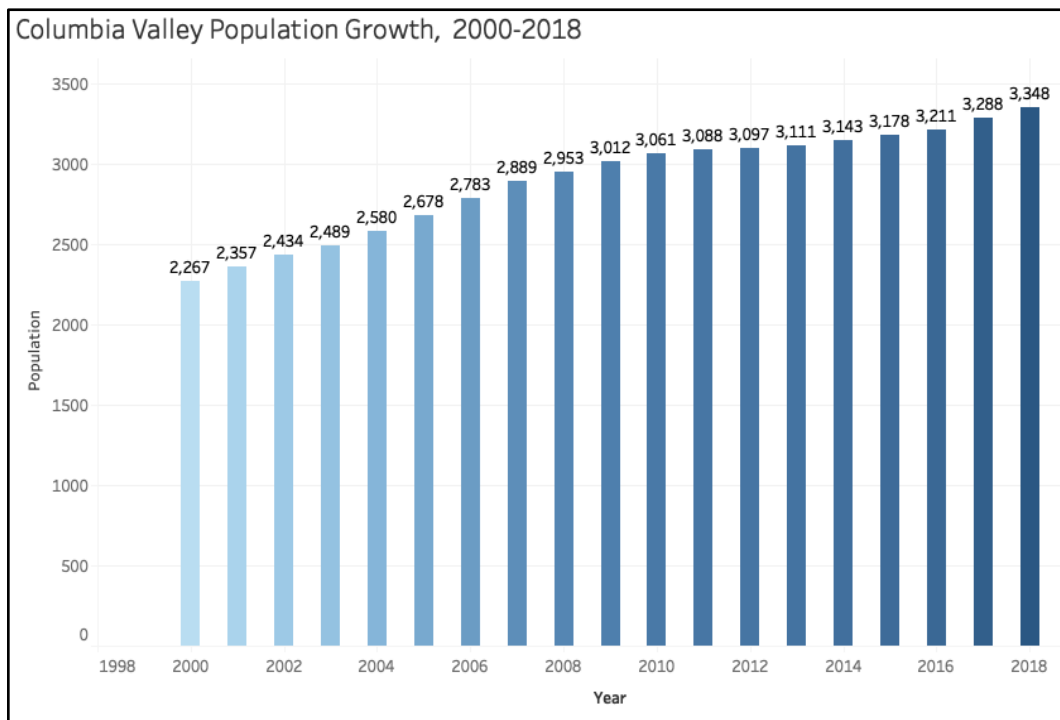
The Mt. Baker School District boasts a significant number of veterans as measured by percent by household as well as significant population with a disability, both of which are higher than the County as

a whole. Adults living with a disability, especially a mental health disability, are at a higher risk of being food insecure.<sup>35</sup> In addition, the area is home to a higher percent of households with children than the County.

Households, 2012-2016	Mt. Baker	Whatcom County
Number of Households	5,657	81,019
Households with Children (Under 18)	30.2%	27.3%
Speak a Language Other than English	9.4%	12.4%
Veterans Population	11.2%	8.2%
Population with a disability	15.6%	13.6%

The Columbia Valley Urban Growth Area (UGA) is located within the Peaceful Valley CDP. The population in the UGA continues to rise with an increase of 9.38% from 2010 to 2018.<sup>36</sup>

There is consistent population growth in the Columbia Valley Urban Growth Area (UGA) from 2000 to 2018. The growth rate in the Columbia Valley UGA was 47% from 2000-2018 and the area continues to be a place of growth and development. Community members living in the area perceive these population estimates to be low. It will be important to revise this information after the 2020 Census.

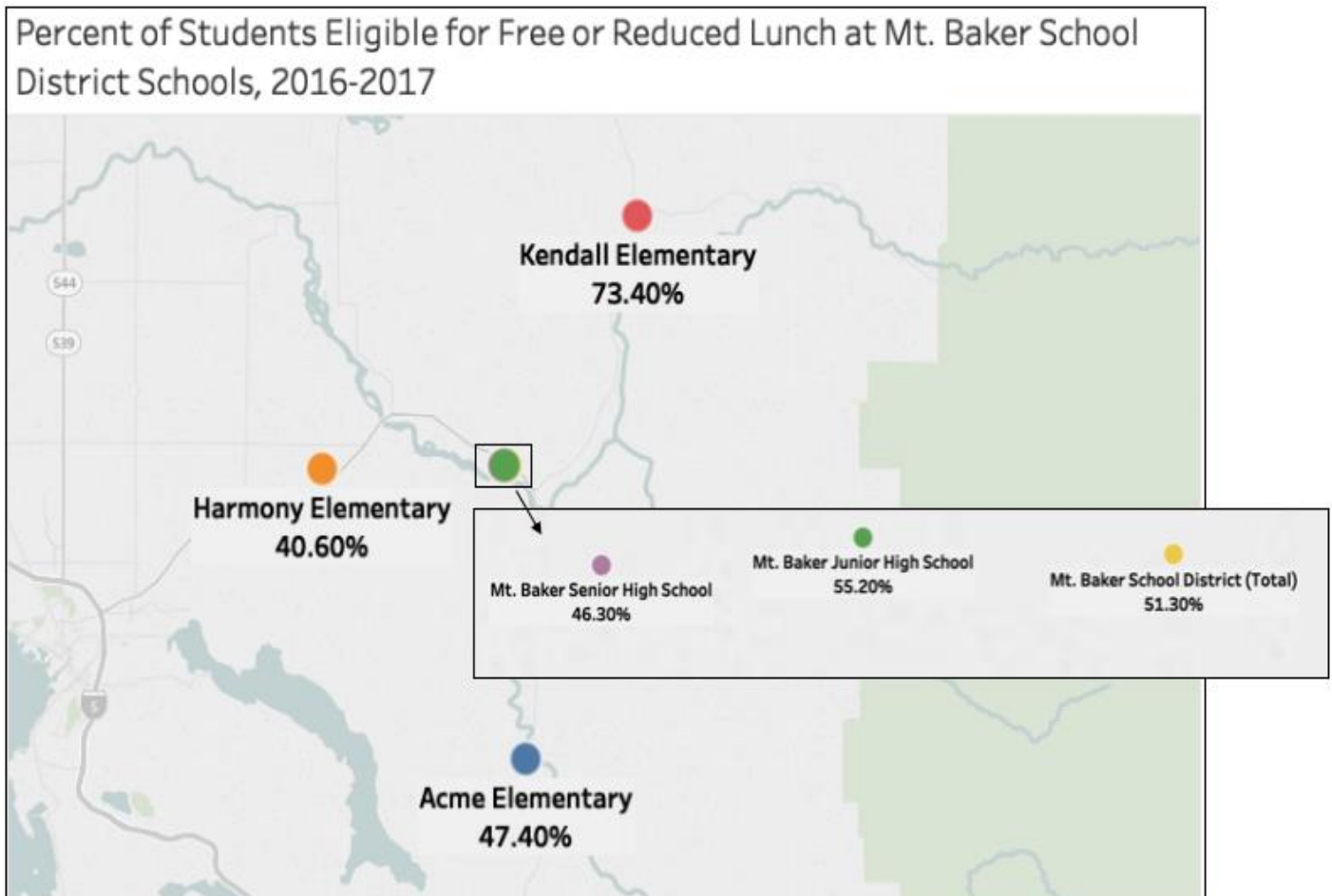


## Economic Indicators

Income and Poverty, 2016-2017	Mt. Baker
Children eligible for free-reduced lunch per 100 students	51.3%
Supplemental Nutritional Assistance Program (SNAP) Recipients	21.79%
Temporary Assistance to Needy Families (TANF), per 100 Child Recipients	5.53

The economic indicators provide additional descriptors to understand the vulnerability of East Whatcom residents and their struggle to access healthy, affordable food. Children eligible for free-reduced lunch per 100 students and SNAP and TANF recipients are all higher than the County as a whole (42.8%, 17.7%, and 5.05, respectively).

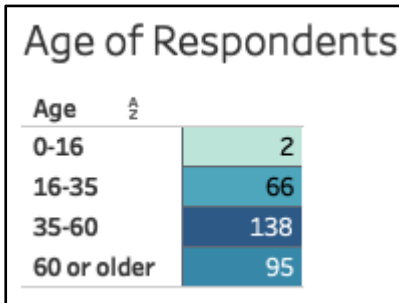
Kendall Elementary School has the highest percentage of students eligible for free or reduced lunches in the Mt. Baker School District. Kendall Elementary services the Peaceful Valley, Kendall, Maple Falls, and Glacier CDPs. These CDPs are ones with the farthest distances to a grocery store in all of East County.





## East Whatcom County Community Survey

The community survey was conducted by convenience sample through online and paper formats. In total, 302 surveys were completed. Because questions were optional, not all respondents answered each question. For example, there are only 301 answers to the age question on the survey. Sample size information will be included for each question.



### Respondent Demographics and Shopping Frequency (n=301)

The largest group (45%) of survey respondents were between the ages of 35-60. This is similar to the age distribution throughout the Mt. Baker School District where 56.4% of residents are between the ages of 25-64. The majority (53%) of respondents live in Columbia Valley. For this survey, we classified Kendall, Peaceful Valley, and Paradise Valley as "Columbia Valley" to avoid confusion with respondents. The second and

third highest represented area was Maple Falls at 20% and respondents. The rest of the parts of East County: Acme (3%), (4%), Nugents Corner (3%), and Sumas (1%).

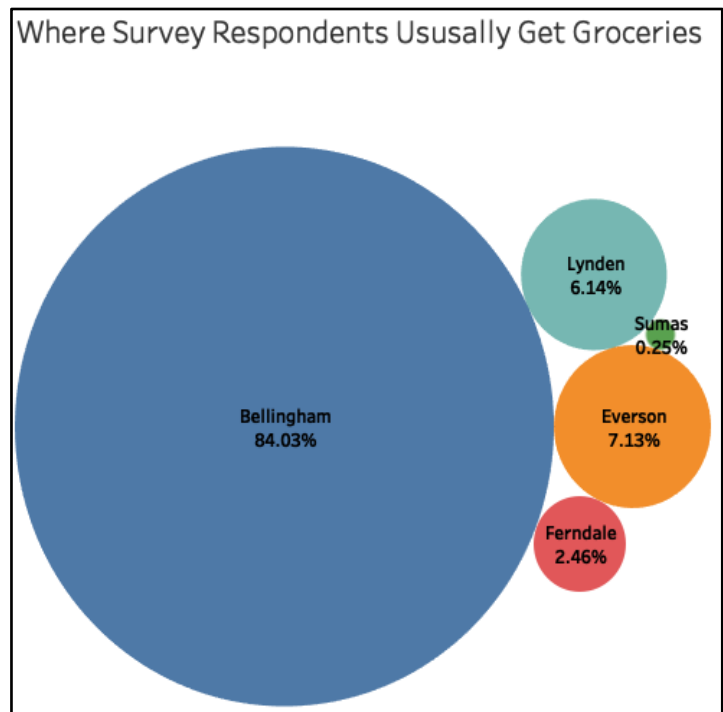


area was Maple Falls at 20% and respondents. The rest of the parts of East County: Acme (3%), (4%), Nugents Corner (3%), and Sumas (1%).

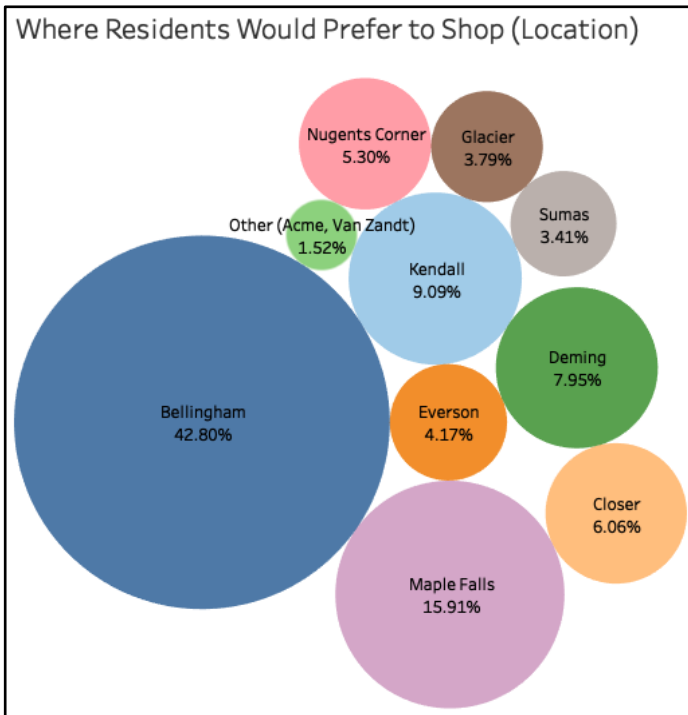
Most respondents usually shop for groceries at least once a week, though 30% stated they shop twice or more per week. Some respondents (18%), stated they shop either once a month or less for groceries. This is potentially due to transportation, geographical distance, cost, and lack of selection and availability of fresh produce and other items close to home.

### Current & Preferred Location & Store (n=342)

These questions asked responders to write in the three places where they currently get groceries. These responses were aggregated and thus have a sample size larger than the number of survey respondents.



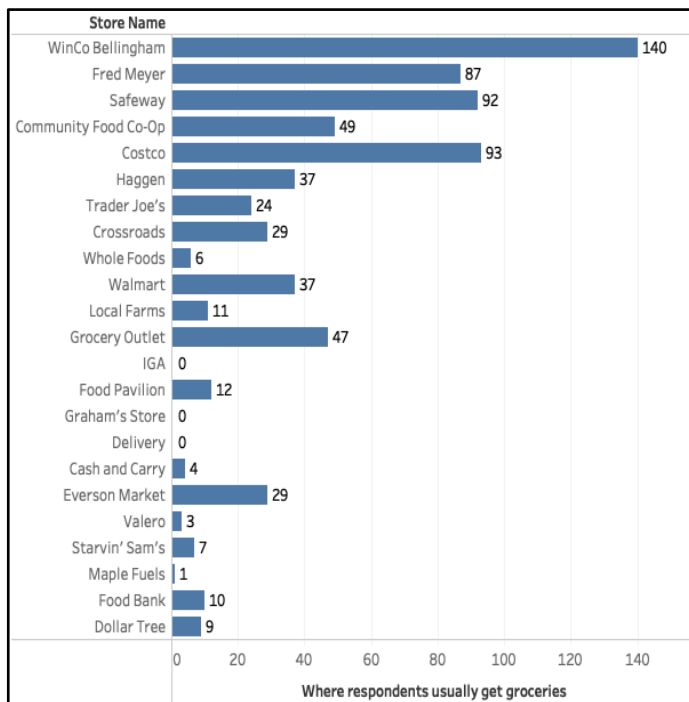
The majority of survey respondents (84%), selected Bellingham as one of the top three locations where they usually get groceries. Everson was the second highest place where people are currently getting their household groceries. However, residents would prefer to shop closer to where they live, if a store that met their needs was accessible. Only 42% stated they would prefer to continue shopping in Bellingham if they had other, closer options. All other respondents would prefer to shop somewhere closer to their homes in East County.

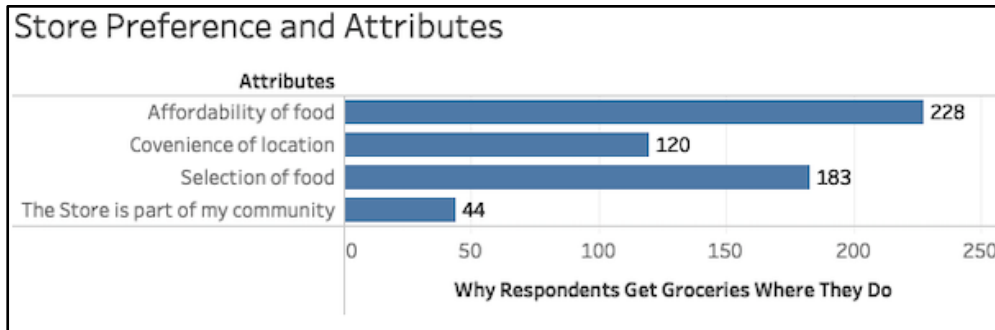


The highest utilized store among respondents was Winco in Bellingham. This is consistent with the findings from the 2013 survey. Costco, Safeway, and Fred Meyer were all top selections for where people are currently shopping. Crossroads was the most preferred Convenience Store in the Foothills, but some people are getting their groceries at other convenience stores in the area such as Starvin' Sams (a.k.a. Valero) and the Texaco (a.k.a. Paradise Market). Others identified currently getting their groceries at the food bank or Dollar Tree, highlighting the need for affordable, accessible food.

### Store Attributes (n=302)

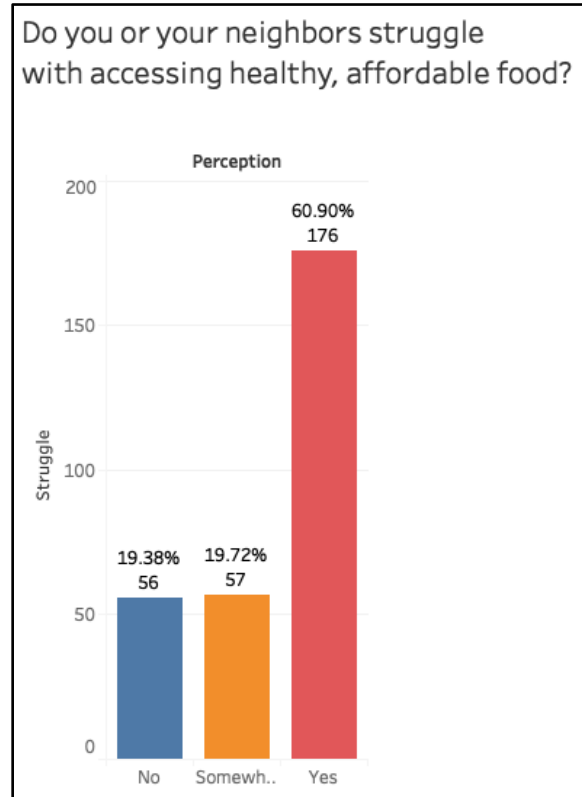
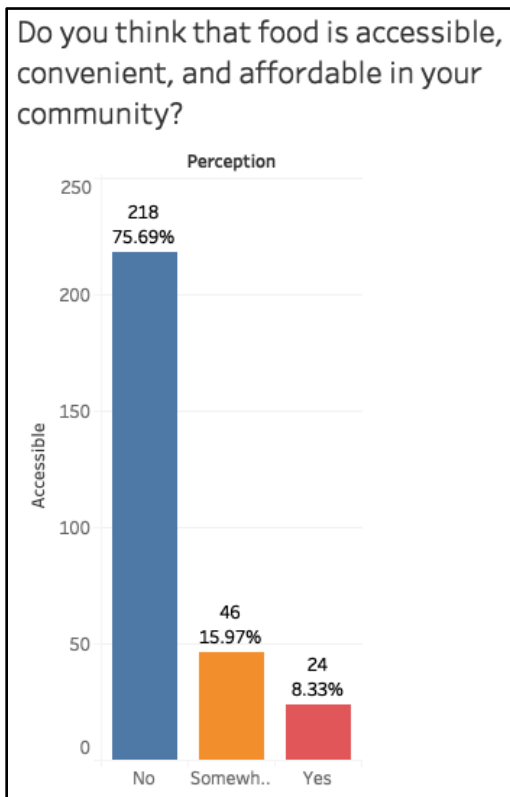
Respondents were able to select multiple options for this question asking why their household gets groceries at these places. Affordability of food is still very important to respondents with 75% of respondents selecting it as a reason why they currently shop where they do. Selection of food and variety was also reason many people shop where they do (60%), including organic options, other specialty dietary items, and ability to buy in bulk.





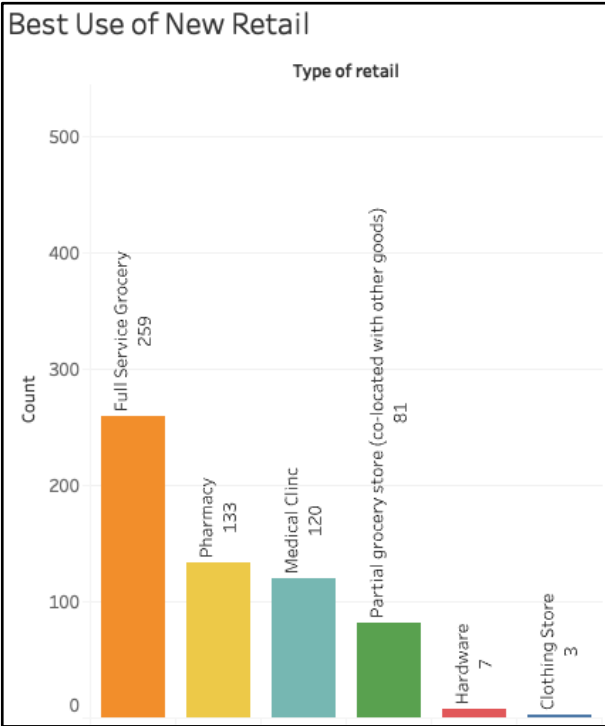
### Food Accessibility and Security (n=289)

East Whatcom residents are very aware they are living in a food desert, noting they not only struggle accessing healthy, affordable food, but it is not available in their community.



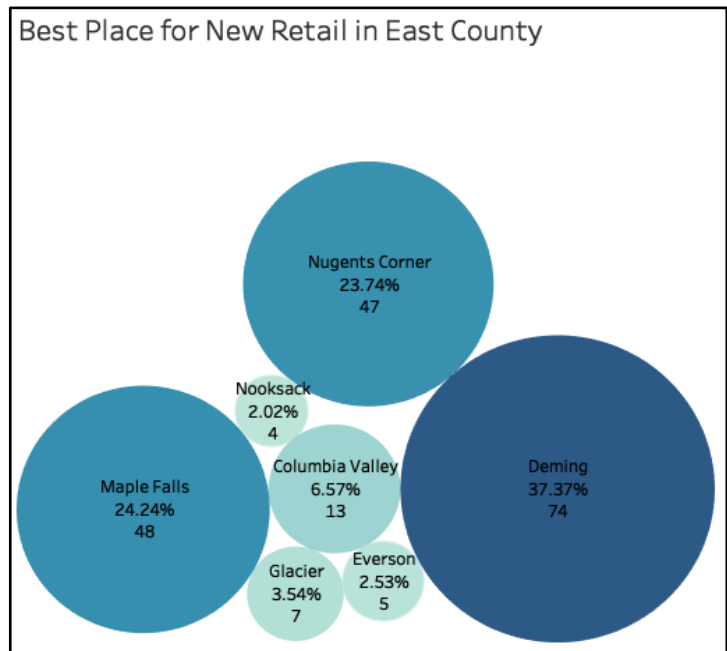
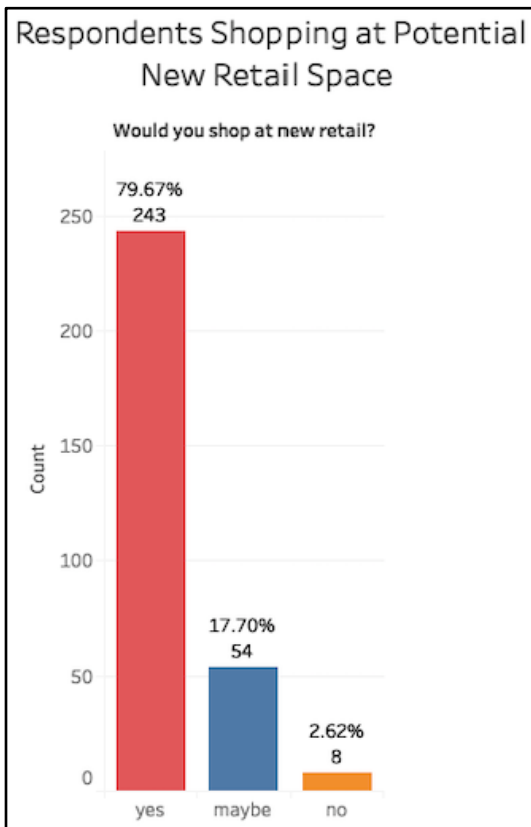
### Use of New Retail

Residents expressed their desires for the commercial landscape and opportunities for economic development and retail in East County. While a full service grocery topped the list, pharmacy and medical clinic were also priorities for residents.



*“It would be nice to have a pharmacy or drugstore because I have to drive in at least once a month to get a couple of prescriptions.” (EWRRRC Focus Group Participant)*

Residents feel that Deming and Nugent’s Corner would be an ideal location for new retail. This could be due to the fact that there has been grocery retail in the past and opportunities for the future, as there is a building ready to house a grocery store. In addition, both Deming and Nugent’s Corner have commercial areas. Deming with the Library, Nooksack Market, and High School/Jr. High Campus and Nugent’s Corner with Subway,

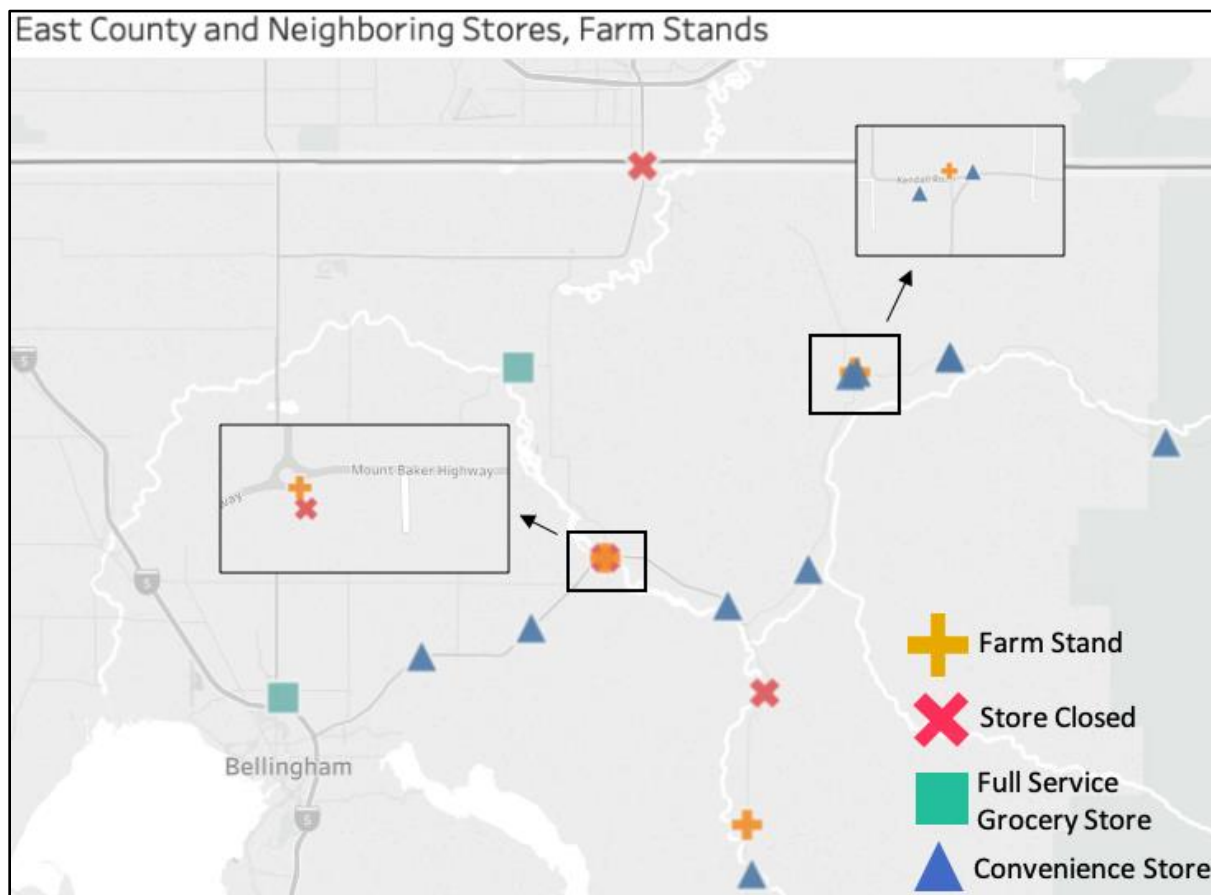


Nugent’s Corner and Deming are also convenient locations for residents traveling into Bellingham and tourists visiting the Mt. Baker area as they have commercial areas located along Mt. Baker Hwy 542.

Overwhelmingly, 80% of respondents stated they would shop at a new retail space in East County. While it would depend on the selection, price, and convenience of a new grocery store, residents are eager to support new development closer to their home and in their (collective) community.

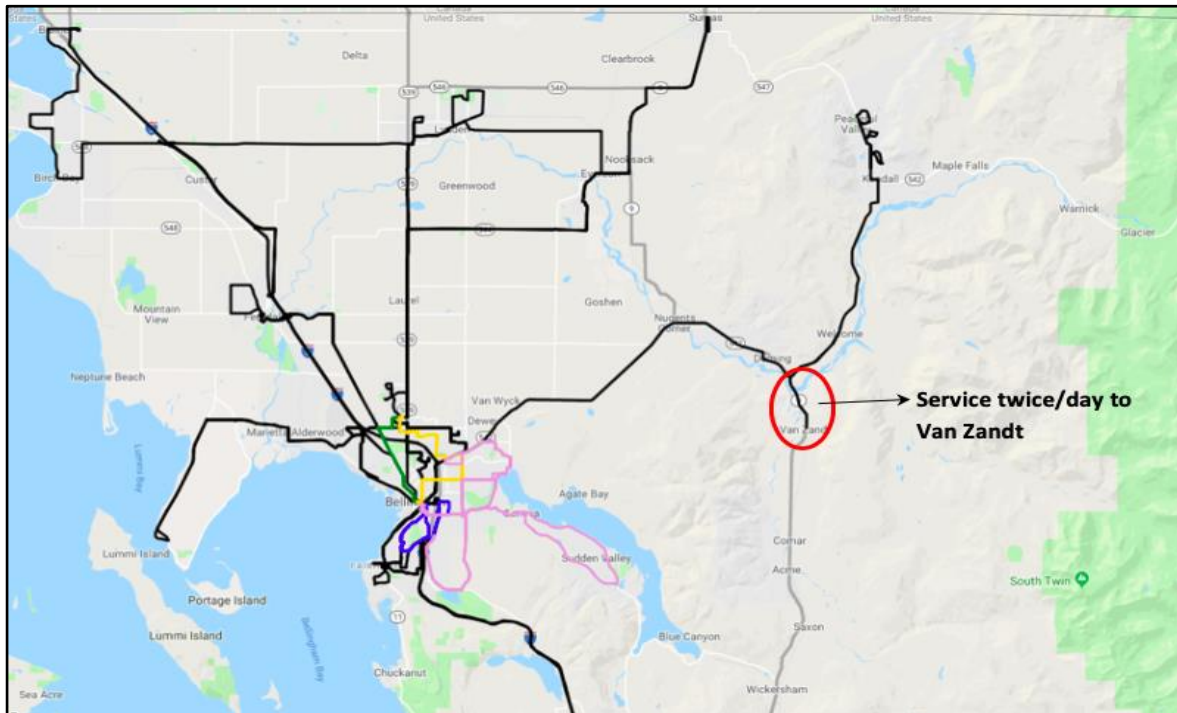
## Supermarkets, Convenience Stores, and Farm Stand Identification in East Whatcom County

**East Whatcom County has no full service grocery stores.** This is a change from 2013, as multiple stores have closed since that assessment was conducted. Everson Market is the nearest grocery store to the EWRRRC Service Boundary. Below is a map outlining convenience stores, most utilized grocery and closest grocery full service grocery stores to EW CDPs, and farm stands in East County. This map also includes the three East County (and adjacent) stores that have closed since the 2013 report was completed. Bromley's IGA in Sumas and Dodson's IGA in Nugent's Corner both closed their doors in 2017.<sup>37</sup> In addition, Everybody's Store in Van Zandt, known for their selection of specialty cheeses and hearty sandwiches, closed at the end of 2018. All three stores were staples in the community, and according to the 2013 assessment, Dodson's IGA and Bromley's IGA were the second and third most utilized stores by survey respondents.<sup>1</sup>



## East County Public Transportation & Commutes

Commute time by personal vehicle has not changed since 2013. It still takes 40-45 minutes to get to Bellingham from Kendall, 55 minutes from Glacier, and 40 from Acme. The Whatcom Transportation Authority (WTA) bus routes have also largely stayed the same since 2013 for East County riders.<sup>1</sup> However, due to the closure of the Dodson's IGA, commute time to groceries by public transportation has doubled.



*"But most families don't have the privilege to drive back and forth. Right? Right. And is it accessible? No. **Healthy, fresh food is not accessible.**" (Deming Focus Group Participant)*

All East Whatcom CDPs - Peaceful Valley, Acme, Kendall, Maple Falls, Glacier, and Deming - are all over ten miles from a grocery store and the entire census tract is considered a food desert by standard definition.

### **Whatcom Transportation Authority Bus Route, 2019**

Residents of Maple Falls, Acme, and Glacier continue to have limited access to public transportation. WTA does offer dial-a-ride services in these areas. There is currently no route connecting Peaceful Valley/Kendall area with Everson, Nooksack, and Sumas. However, WTA had proposed a new route to connect some areas of East County with Lynden. The proposed route would have run four times each day on Monday, Wednesday, and Friday. **This would have been a two year pilot project route between**

Lynden and Maple Falls, however WTA was not awarded a grant for this route and it will not be implemented.

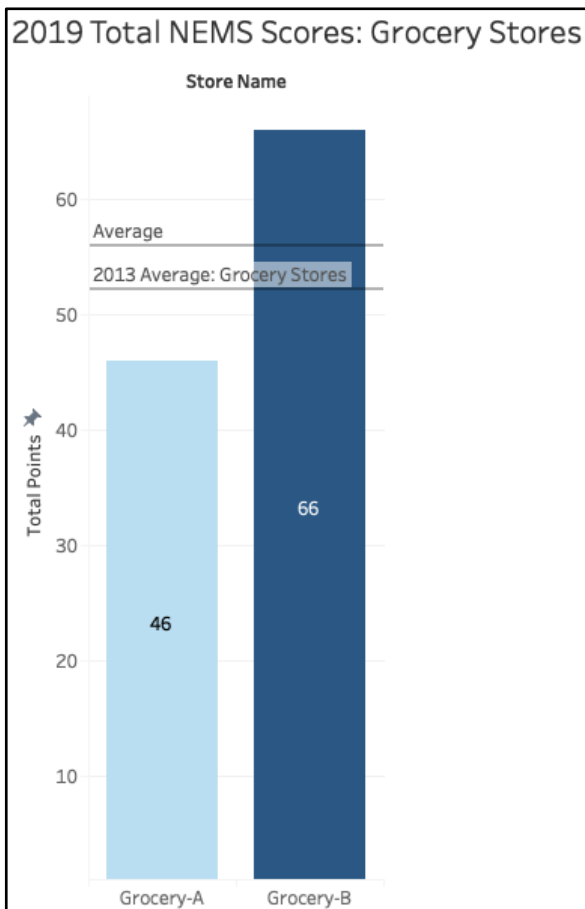
### WTA Proposed Route 64: Maple Falls - Lynden



### Store Surveys: Nutrition Environment Measures Survey

The NEMS survey is a tool to measure food items in any given store. Because East County residents live far from full service grocery stores, it is important to understand what food items and produce is available in

the convenience stores closer to them. The NEMS assessment allows us to compare food items offered and cost in different stores throughout East County. Because this assessment was used in 2013, using the same tool will allow us to compare over time and determine changes of food availability, quality, and price. Due to stores closing in the region fewer stores were surveyed in 2019. **The 2013 assessment included four grocery stores and six convenience stores. This assessment surveyed two grocery stores and seven convenience stores.**



#### NEMS Scoring

The NEMS assessment is scored based on two criteria: availability and price. If an item is offered, the store receives 0-3 points depending on the item. If more varieties are offered, the store receives more points. If lower fat options, such as low fat milk or lean meat, are priced lower than their higher fat counterparts, the store receives an additional 2 points. If the opposite is true, and a higher fat content item is less expensive than a

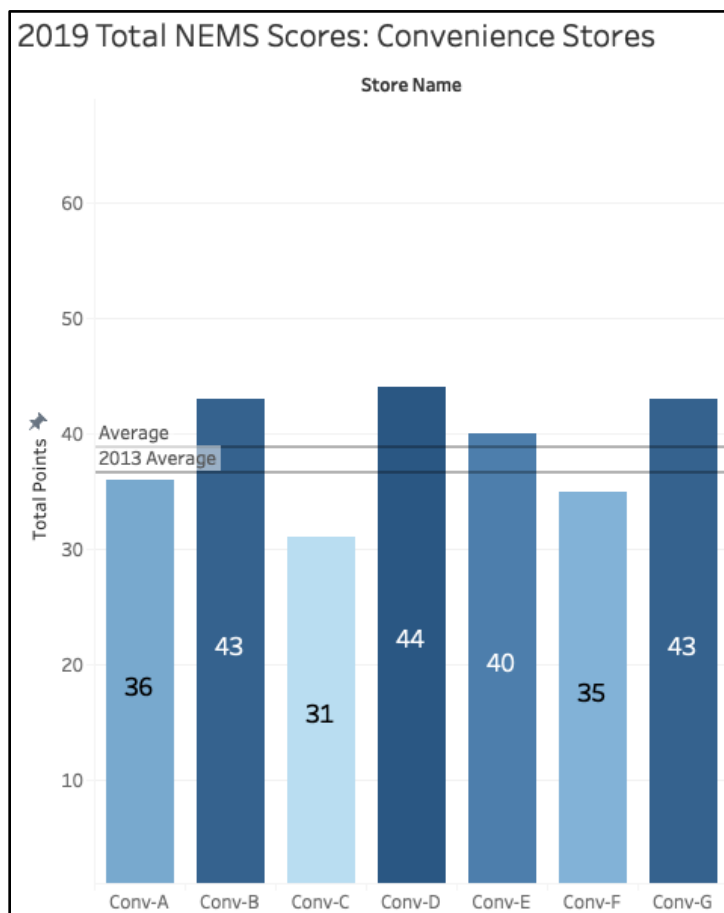
lower fat item, the store receives a negative one point. In addition to price and availability, produce is scored with a quality measure. If 75% or more of the fruit and vegetables offered is of acceptable quality, the store receives six total points, three for fruit and three for vegetables. Fruit and vegetables are scored separately.

Additional measures were added to the East Whatcom NEMS: cereal, canned fruit and vegetables, and frozen fruit and vegetables. Cereal is scored the same as above; a store receives two points if the healthier option is available (for example, canned fruit without sugar), as well as an additional point if more varieties of the healthier option is available. Canned and frozen fruit and vegetables were scored only on availability. There are 69 possible points.

Averages for both grocery and convenience stores are higher in 2019 than they were in 2013. However, fewer grocery stores were surveyed for this assessment. The scores ranged from 30-40 for convenience stores and 50-56 for grocery stores in 2013. **The average NEMS score for the convenience stores surveyed in East Whatcom was 38.9, compared to 36.7 in 2013. The average score for grocery stores surveyed is 56, compared to 52.25 in 2013.**

East Whatcom Stores surveyed scored well on the NEMS survey for availability of beverages, produce, bread, cereal, dairy products, and canned and frozen fruits and vegetables. They scored less well on

availability of lean (<10% fat) ground beef, frozen dinners, low fat baked goods and baked chips. Only three stores carried baked chips at all, and only three carried lean ground beef. Most stores scored well on bread and cereal pricing, though not all. Where low fat baked good options were available (4 stores), they were priced lower than the full fat alternatives. Another explanation is that full fat alternatives (muffins, Danish) were less available at most convenience stores and English muffins and bagels were more available. Beverage pricing was evenly split between stores. Three stores scored poorly on pricing of beverages where 100% juice and/or diet soda is more expensive than high sugar juices and regular soda, but three stores priced juice and soda the same, and three stores priced diet soda and/or juice lower than their

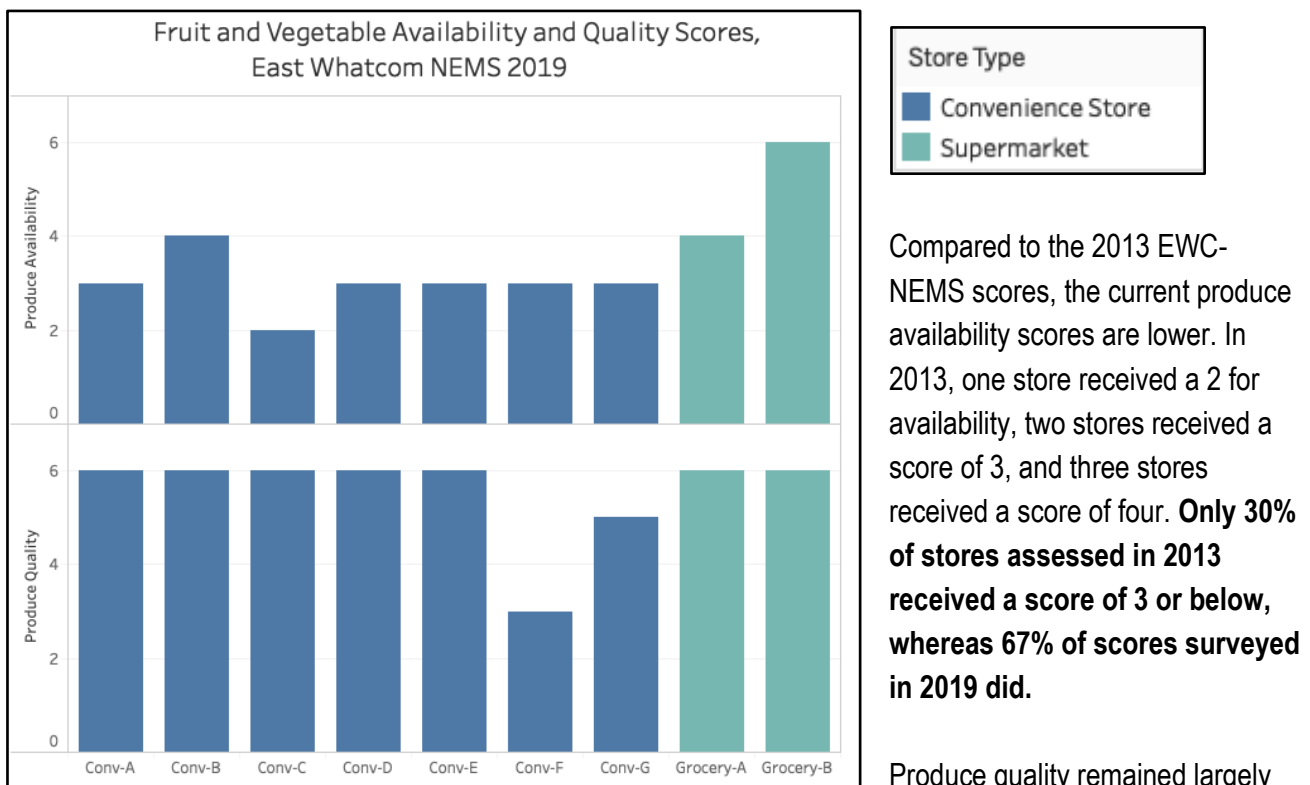




higher sugar content counterparts. Overall, if stores did score poorly on pricing it is primarily due to the item not being available, in which case they received a zero score.

### Produce Availability and Quality

Stores surveyed had an opportunity to receive a total of 6 points, 3 each for fruit and vegetable availability and 3 each for fruit and vegetable quality. It is important to note that NEMS Surveys were conducted in January and February of 2019, and some after a winter storm. Stores may not offer as much fresh produce in the winter time due to availability and cost. Some convenience store managers did state they receive their produce from local growers which may impact their availability throughout the winter. Fruit may be difficult for smaller stores to get in the winter due to price as well, as it is generally not in season. Most (66%) of stores surveyed had <5 varieties of fruit available at the time of the survey.



Compared to the 2013 EWC-NEMS scores, the current produce availability scores are lower. In 2013, one store received a 2 for availability, two stores received a score of 3, and three stores received a score of four. **Only 30% of stores assessed in 2013 received a score of 3 or below, whereas 67% of scores surveyed in 2019 did.**

Produce quality remained largely consistent aside from Convenience

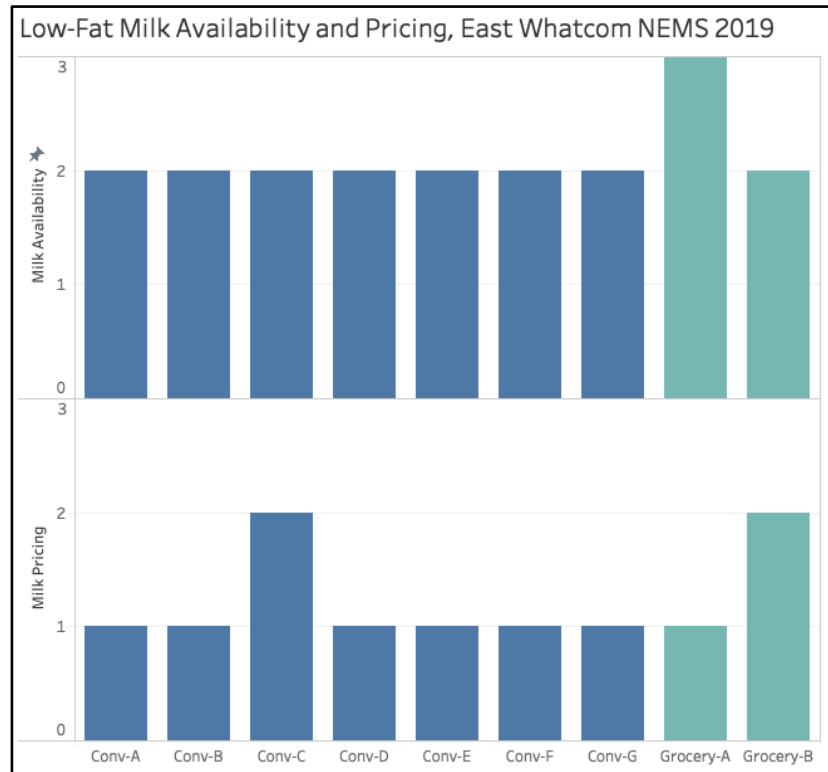
Store F receiving the lowest score of 3. They received a score of 1 for fruit quality, indicating that 25-49% of available fruit was acceptable. Fruit identified as unacceptable is “bruised, old looking, mushy, dry, overripe, dark sunken spots in irregular patches or cracked or broken surfaces, signs of shriveling, mold or excessive softening.”<sup>15</sup> In 2013, only one store received a score lower than 6 for produce quality.<sup>1</sup>

### Milk Availability and Pricing

Stores surveyed had an opportunity to receive a total of 5 points, 3 for availability and 2 for pricing.

**All stores surveyed carried low fat/skim milk and most stores priced low fat and whole milk the same.** Only one store, Grocery-A, had a proportion of lowest fat to whole that was  $\geq 50\%$ , which scored them one additional point.

Only two stores, Conv-C and Grocery-B priced low fat lower than whole milk which scored them the full 2/2 points available for milk priced. No stores sold low fat milk at a higher price than whole milk.

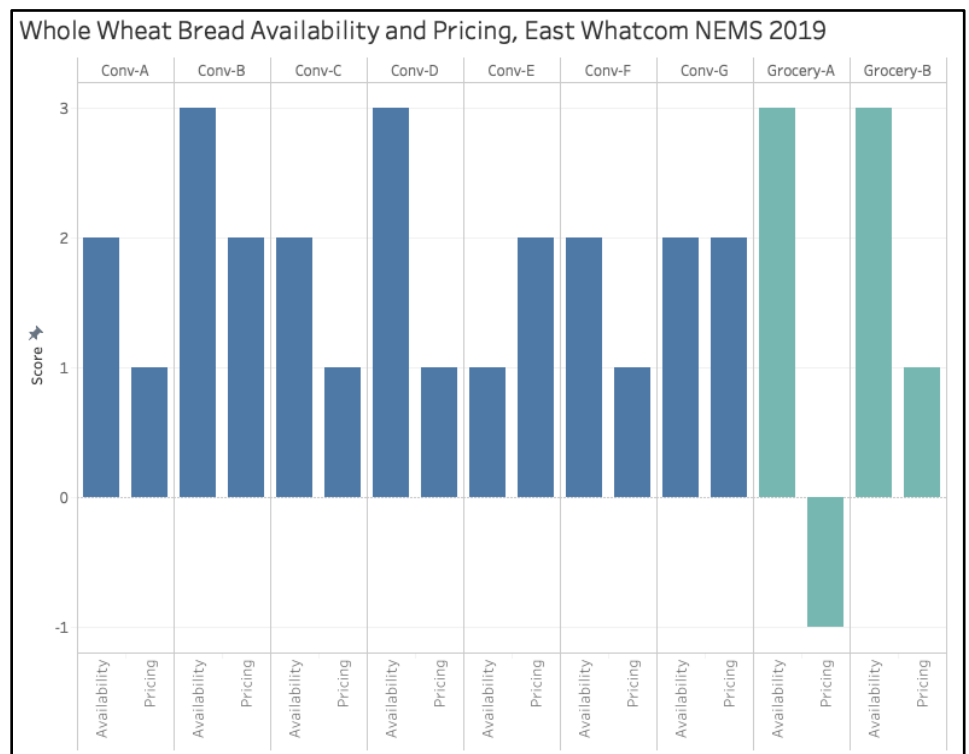


In 2013, all stores surveyed carried low fat milk *and* low fat milk occupied 50% or more of the shelf space. **In addition, 60% of stores surveyed in 2013 priced low fat milk lower than whole milk, as opposed to only 22% of stores surveyed in 2019.**

### Whole Wheat Bread Availability and Pricing

All stores surveyed had the opportunity to receive a total of 5 points, 3 for availability and 2 for pricing.

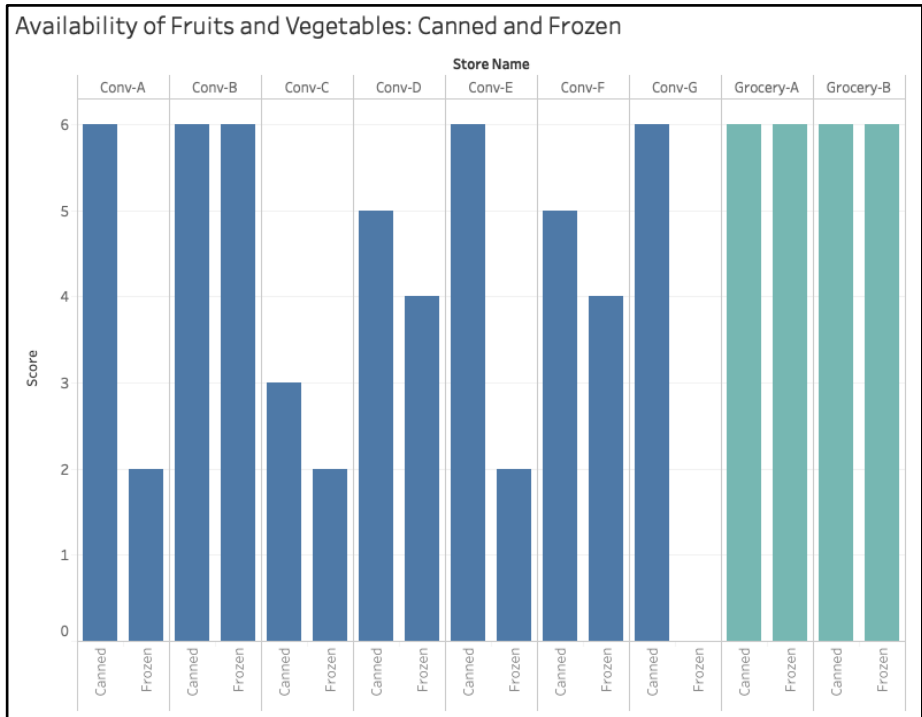
**Most East Whatcom stores carry a variety of whole wheat bread priced either equal to or less than white bread.** Three convenience stores, B, E, and G, all price



wheat bread lower than white bread. All other stores, aside from Grocery-A, price their wheat bread the same as white bread. Grocery Store-A's wheat bread is more expensive than white bread, which is why they received a -1 for pricing. **In 2013, only one convenience store and one grocery store priced their wheat bread lower than white bread.**

***Canned and Frozen Fruit and Vegetable Availability***

Stores surveyed had the opportunity to receive a total of 6 points for both canned and frozen fruits and vegetables. **Most East Whatcom Stores carry both canned and frozen fruit and vegetables.** While some convenience stores (3) scored a 2 for frozen fruit and vegetables, this does mean that they are still available, but limited varieties.



## The Cost of Groceries across East Whatcom Stores

Food item price data was collected at each store surveyed. The table below shows the price for twelve grocery items included in the NEMS survey. The box of the highest price is colored **red**, and the box for the lowest price is colored **green**. A “-” is used when the item was not carried by the store at the time surveying was conducted.

**Table 6. Cost of Groceries Across Convenience and Grocery Stores**

*Pricing: Convenience Stores vs. Grocery Stores*

Store Name	Cheddar Cheese / LB	Spaghetti / LB	English Muffins / 6pk	Standard Ground Beef	Lean Ground Beef/LB	Canned Tomatoes / 14oz	Frozen Peas / 16oz	1LB Carrots	1 ea Apple	Wheat Bread / 24oz	Lowfat Milk / Half-gallon	Cheerios / 14oz
Conv-A	\$ 5.19	\$ 2.39	\$ -	\$ 6.89	\$ -	\$ 1.69	\$ 3.09	\$ 2.40	\$ 0.90	\$ 2.09	\$ 5.09	\$ 5.89
Conv-B	\$ 7.79	\$ 2.39	\$ 2.99	\$ 5.69	\$ -	\$ 2.49	\$ 2.79	\$ 1.19	\$ 0.79	\$ 3.29	\$ 2.69	\$ 5.49
Conv-C	\$ 5.39	\$ 3.49	\$ -	\$ 4.99	\$ -	\$ 2.49	\$ 1.99	\$ 2.49	\$ 0.99	\$ 2.89	\$ 2.49	\$ 3.49
Conv-D	\$ 6.59	\$ 2.29	\$ -	\$ 3.99	\$ -	\$ 1.99	\$ 1.79	\$ 1.69	\$ 1.00	\$ 3.99	\$ 2.89	\$ 4.99
Conv-E	\$ 6.99	\$ 2.59	\$ 2.99	\$ 6.99	\$ -	\$ 2.69	\$ -	\$ 1.99	\$ -	\$ 2.99	\$ 3.89	\$ 5.49
Conv-F	\$ -	\$ 2.59	\$ 4.29	\$ 10.29	\$ -	\$ 2.89	\$ 2.99	\$ -	\$ 0.75	\$ 3.29	\$ 3.99	\$ 3.89
Conv-G	\$ 4.49	\$ 2.29	\$ -	\$ 6.49	\$ -	\$ 2.89	\$ -	\$ -	\$ 1.49	\$ 1.69	\$ 4.09	\$ 6.69
Grocery-A	\$ 4.44	\$ 3.39	\$ 2.79	\$ 3.48	\$ -	\$ 1.99	\$ 1.89	\$ 0.99	\$ 1.50	\$ 3.79	\$ 2.89	\$ 4.29
Grocery-B	\$ 2.88	\$ 0.92	\$ 1.18	\$ 1.28	\$ 4.28	\$ 0.58	\$ 2.18	\$ 0.98	\$ 0.98	\$ 3.23	\$ 1.45	\$ 1.98

The grocery stores are less expensive than the convenience stores. However, there are some items such as frozen peas, apples and wheat bread that are cheaper at the convenience stores. The two grocery stores surveyed also have more food items available than convenience stores. Only one grocery store carried lean ground beef. For this survey, lean ground beef is identified as having 10% fat, 90% lean meat. Standard ground beef is 80% lean.

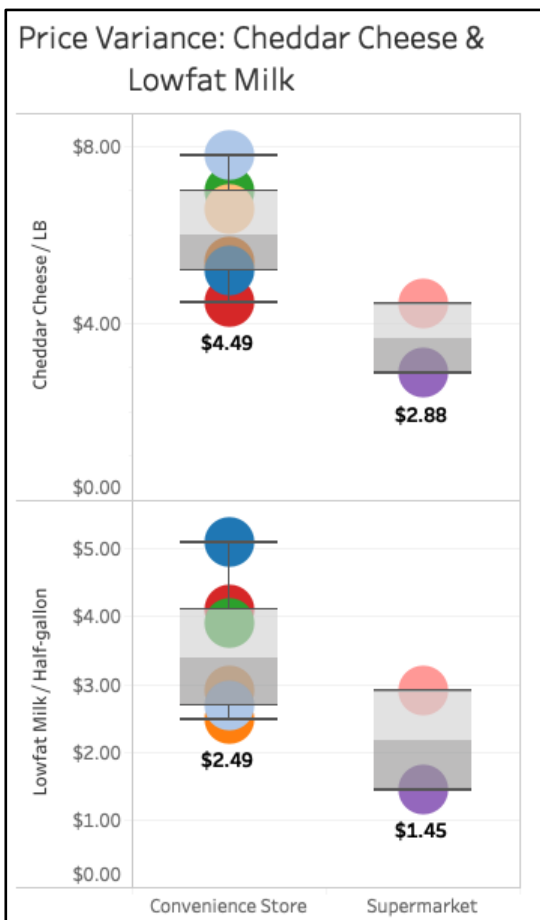
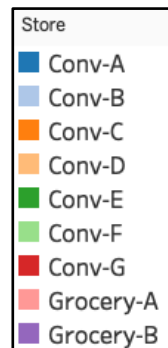
**“Something you get at Winco for a buck or two is \$4, \$5, \$6 here.”** (Deming Focus Group Participant)

Spaghetti, apples, carrots, and frozen peas were relatively consistent across all food stores. This is a similar finding from the 2013 assessment, aside from low fat milk. Low Fat milk is relatively consistent aside from the outlier Convenience Store A, which sells low fat milk for \$5.09/half gallon. **In 2013, only 2 stores (20%) fell outside of the \$2.50-\$3.00 range for a half gallon of low fat milk. Today, four out of the nine stores surveyed (44%) fell outside of that range.** The food items with the most price variance are standard ground beef, cheese, milk, and cheerios. All other items are within \$3.11 of each other. The box-

and-whisker plots below illustrate the variance in pricing between convenience stores and grocery stores. Stores that did not carry the item fall along the \$0.00 line and are excluded from the box-and-whisker plot quartiles.

**Pricing: Total Grocery Bill**

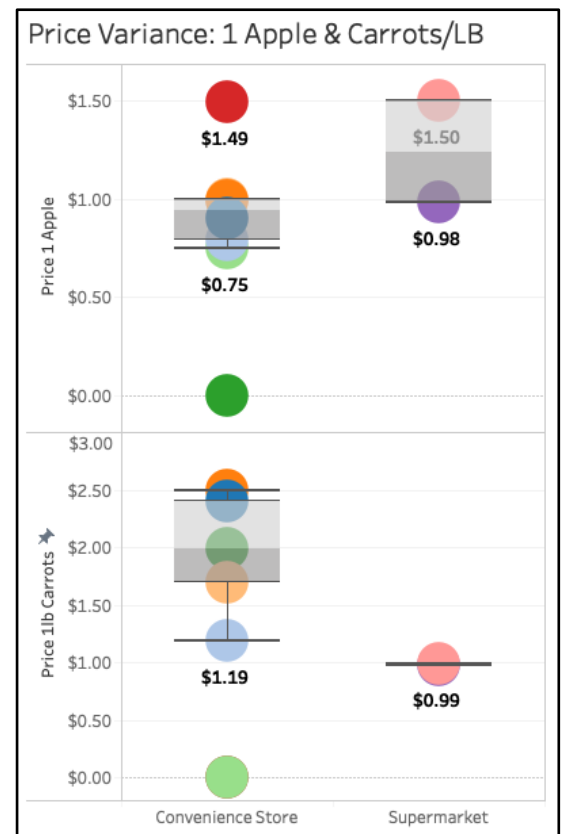
Only three stores surveyed carried all of the items measured for the total grocery bill calculation. The only convenience store was Conv-B. The food items measured as part of the total grocery bill were: cheddar cheese, spaghetti, English muffins, standard ground beef, canned tomatoes, frozen peas, carrots, apples, wheat bread, low-fat milk, and cheerios. Grocery Store B had the lowest price at \$21.92 and Grocery Store A was \$10 more expensive at \$31.44. The one convenience store, Conv-B, had a total grocery bill of \$37.59.



**Dairy product pricing across East Whatcom Stores is not consistent.** This was also the case in 2013. However, the range is much less now than it was in 2013 (\$4.91 range now versus \$5.50 in 2013). It is important to note that the highest price for cheese in 2013 was Everybody's Store (now closed) which carried specialty cheeses and meats. Excluding Everybody's Store from the 2013 calculation would make the range less (\$4.06) than it is today. The median price for cheddar cheese is \$5.29 and \$2.89 for a half gallon of milk. In both of these measures, grocery stores have lower prices.

**The price of apples was lower in East County convenience stores than in the grocery stores surveyed.** Price variance is still greater among convenience stores for both

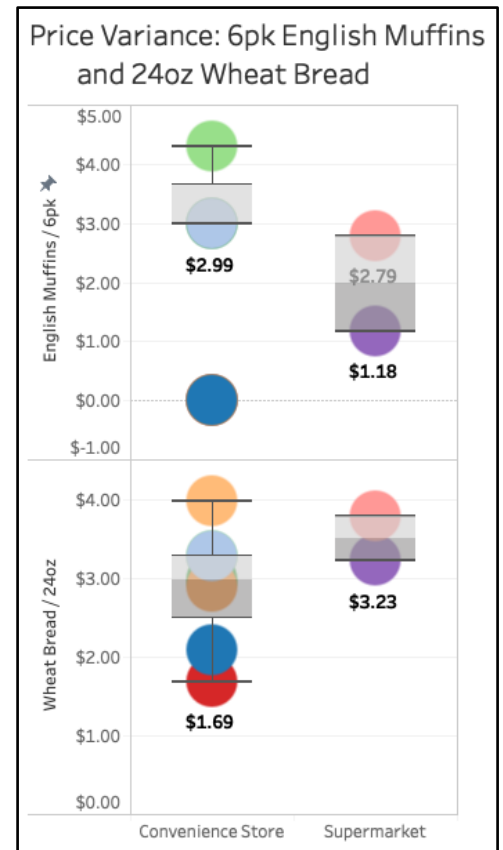
apples and carrots. Apple pricing has stayed constant since the 2013 assessment, and far more stores offer apples than the stores surveyed in 2013. The range for apple prices was \$0.75 to \$1.59 in 2013 and the mean price for one apple was \$0.96. The apple pricing



across convenience stores was also very consistent in 2013, four convenience stores surveyed priced their apples at \$0.75. Today, five stores price their apples within a \$0.25 range (\$0.75-\$1.00). Carrots were cheaper at the grocery stores. The mean carrot price at convenience stores was \$1.68, and ranged from \$1.19 to \$2.49 for one pound. In 2013, the median price for one pound of carrots was \$1.79, however the range was \$0.69 to \$2.00. The mean price for one pound of carrots in 2013 was \$1.28, lower than it is today.

**A six-pack of English muffins is cheaper at the grocery stores surveyed, but a 24 ounce loaf of wheat bread is cheaper at convenience stores.** There is greater price variance in grocery stores than convenience stores for English muffins. The average price for a six-pack of English muffins was \$1.98 at grocery stores and \$3.42 at convenience stores. In 2013, the average price for English muffins was \$2.25 for grocery stores and \$2.94 for convenience stores. A 24 ounce loaf of wheat bread has a greater price variance in convenience stores but is also much cheaper than the grocery stores surveyed. The mean price for wheat bread at convenience stores is \$2.89, and \$3.51 at grocery stores. At the stores surveyed, the price for wheat bread had decreased in convenience stores and increased in grocery stores since the 2013 assessment. In 2013, the lowest price for a 24-ounce loaf was \$0.98 in a

grocery store and \$1.79 in a convenience store. The average price for a 24-ounce loaf of wheat bread was \$1.70 in grocery stores and \$2.59 in convenience stores, according to the 2013 assessment.



**Since 2013, more convenience stores in East County are carrying standard ground beef (4 stores in 2013 and 7 in 2019), yet none stock lean ground beef (<10% fat).** The price of standard ground beef is very variable throughout the East County convenience stores surveyed, ranging from \$3.99 to \$10.29 for one pound. One store in East County had stocked lean ground beef. While overall supply of ground beef has increased, nutritional content has not.

## East Whatcom Food Landscape Focus Groups

Two focus groups were held to get a better understanding of community perceptions surrounding the food landscape. The table illustrates the major themes presented by residents along with applicable quotes from each focus group. In total, ten resident-participants attended focus groups; 3 at the Deming Library and 7 at the East Whatcom Regional Resource Center. There were eight females and two males in total; three females attended the Deming focus group and five females, and two males attended the East Whatcom Regional Resource Center focus group.

Tables 7-10: Focus Group Major Themes, Subthemes and Quotations

Major Theme		There are many barriers to accessing healthy, affordable food for residents in East County.	Quotes from Focus Groups
Subtheme	Transportation/ Distance	Transportation is a barrier to accessing healthy, affordable food due to limited bus service, time constraints, or no vehicle access.	<i>“Transportation is always an issue up here.” “Especially with transportation issues and the cost of transportation for folks that live farther East and farther South.”</i>
	Higher Local Prices	Prices for grocery and convenience stores in East County are much higher than Bellingham and therefore some residents are reluctant to shop there.	<i>“The cost out here is significant, triple.”</i>
	Lack of Knowledge	Perception that some people do not have the knowledge to eat a healthy diet, and sharing information about local farmers market programs is difficult due to a lack of information system to share with residents.	<i>“It’s a matter of discipleship; that they have to become a learner and they have to learn how to handle fresh produce. And take it from point A to point B, and they’ve got to be convinced that a fresh vegetable diet is essential to good health.”</i>
	Choice Limitation	Due to cultural or dietary needs, residents were not able to find the food they need and/or want at their local stores; therefore travel to larger stores is necessary.	<i>“We have to go to Bellingham to find a lot of gluten-free food. You have to shop at the Co-Op, or Fred Meyers has a section that’s got some health food items. And so we have to make a circuit even when we go into town to provide for our food.”</i>
	County Regulations	Perception that County regulations limit the feasibility of local convenience stores from expanding to offer more grocery, produce, or other goods.	<i>“But the county regulations were so onerous that it became financially not doable.”</i>

Overall, focus group participants were aware of the many barriers to accessing healthy, affordable food including lack of transportation, higher cost of groceries, and limitations on selection of available food. To overcome these barriers, participants stated they chain trips when going into town and limit the amount of grocery shopping they do throughout the month. This was echoed in the community survey, as 46% of respondents stated they grocery shop once or twice a month. Community connectedness was also important as some participants stated they check in with friends, neighbors, or family before driving to Bellingham to see if anyone needs anything.

Participants shared frustrations with Whatcom County regulations for building or expanding current stores. Examples were shared of community understanding of the process for permits and navigating the County system. **In addition to the cumbersome permitting system, participants voiced opinions of feeling left behind and forgotten from County government.** One participant stated *“It is like they [the County] don't care about East Whatcom until recently” (EWRRC Focus Group Participant).*

Major Theme		Opportunities exists for improving food security in East County	
Subtheme	County Regulations	Perception that County regulations limit the feasibility of local convenience stores from expanding to offer more grocery, produce, or other goods.	<i>“I've heard that before that the county has been very hard to work with with anybody that wants to come up here and establish something and start building some on the system and something that they're dressed for fighting them tooth and nail is like they don't care about East Whatcom”</i>
	Information Sharing	There is a lack of communication system in East County, it is difficult to share information about programs, services, or events with all residents.	<i>“Communication is definitely an issue in this area; so much of it is word of mouth.”</i>
	Resource Sharing	Residents chain trips to save on gas money and time, and carpool with friends or family to meet their grocery or other errand needs.	<i>“I do a whole months' worth [of shopping] in a shot. “ Maybe I have to go into Bellingham for the pharmacy or something else. So I'm just going to go grocery shopping.”</i>

The Focus Groups brought to light the many different opportunities for improving the food landscape in East County. County regulations were included in opportunities because there is potential for change or improvement with these systems. While much of the permitting and regulatory system may be out of Whatcom County’s control and at the State level, the County should determine how their systems are impacting the feasibility of grocery retail in food deserts.

While many food related programming exists in East County (produce markets, library educational events, seed swaps, and more) residents brought up the need for a better communication system to share information about events and programs. For example, sharing information about Twin Sisters Market accepting EBT was identified as something that should be widely shared, but due to lack of communication infrastructure many in the region rely on word of mouth. In addition to communication, resource sharing was illustrated as an asset and opportunity for the food landscape due to ride sharing and trip chaining.

Major Theme		Opportunities exist for retail and commercial growth in East County.	
Subtheme	Choice Limitation	There is desire for local stores to carry a wider selection of foods that meet their dietary and/or cultural needs.	<i>“I would like to see more fresh fruits and veggies” “Toiletries, laundry soap, housewares. You know, diapers. Things like that that people need that are the things that you most commonly run out of.”</i>
	Supporting Community	Many local fruit and vegetable resources exist in East County and residents are	<i>“We have Twin Sisters Farmers Market now. They don't jack the prices real bad. The biggest problem I had was a couple of times I went they</i>



	Assets	interested in supporting and purchasing food from within their community.	<i>weren't able to use their reader for those that are on EBT; we get fresh bucks. And we didn't get our fresh bucks because this their thing wasn't working. But if we could really encourage... to keep that group going and help those because I go down there every Saturday"</i>
	Retail Support	Residents would support a new grocery retail establishment, even if only for some of their grocery needs.	<i>"Whoever comes up here has to be able to show the community we are investing in you because we are going to be part of the community and we sell vegetables too." "And if there was a full grocery store in this area or if the Dodson's market area was turned into a grocery store again, I could see myself shopping there."</i>

The retail environment in East County is limited, and residents identified multiple services they would appreciate having closer to their homes in both the community survey and focus groups. There was emphasis placed on desire to support a retailer who was community-minded and wanted to invest in the area by carrying local produce as well as a wider selection of food. Focus group participants mentioned how some of the existing stores struggle with ownership and have changed hands multiple times in the past few years.

Participants were also interested in growing existing community assets, such as summer produce markets, and supporting fresh, local produce from their own community. Many focus group participants stated they would purchase some food, if not all, at a local retailer if a new store was to open that carried a wider variety of food.

Major Theme		The food landscape of East County impacts the health of East County residents.	
Subtheme	Food Security and Health	The majority of food currently available in East County stores is unhealthy and does not meet resident's dietary needs.	<i>"And there are three aisles of bags of candy and potato chips and all that kind of crap food. They don't seem to get that a lot of people live here year-round and they want a grocery store." "I mean you're paying premium prices for food that is not giving you good nutrition for calorie content."</i>
	Other Retail	Residents are interested in seeing a range of commercial retail to support their needs.	<i>"I think a pharmacy would be really important." "I do think about the dentist, you know, and some health services, or even an urgent care."</i>
	Independence	East County residents are independent and community minded.	<i>"This community is heavy organic, heavy non-GMO. I see a huge difference in this community than I do in Bellingham. They'll buy anything." "We're very independent up here it believe it or not." "We have to we have to get the County Council and the county people to kind of rethink what's happening up here."</i>

Residents were very aware that the food landscape of East County impacts the health and wellbeing of their community. In addition to not having the food resources they feel they need, residents identified not

having access to other services that would improve their lives, such as a pharmacy, dentist, or other medical provider.

While participants did identify many challenges and frustrations with the food landscape in East County, they also provided insight for opportunities for growth and improvement. Residents of East County are resilient and community minded. They are interested in spending their money locally and having access to fresh produce and meat from local farms and in turn value store owners and managers that invest in the local community.

## Discussion and Conclusion

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The population of East Whatcom County is comprised of over 15,000 residents and has the highest percentage of people with a disability in all of Whatcom County. The Foothills are also home to the second highest population of veterans in the County (11.2%). In addition, Kendall Elementary school has one of the highest rates of free and reduced lunch eligibility in Whatcom County. Average commute time for East County residents to a grocery store is 40 minutes, and the only stores in the region are convenience stores. This combination of factors speaks to the vulnerability of East County residents and their overall ability to access and afford healthy food.

There was an improvement in the food landscape in terms of availability and overall NEMS scores, however residents are interested in greater selection in East County Stores and struggle with access, compounded by multiple stores closing in the region in 2017. East County convenience stores carried a range of items including produce, frozen fruit and vegetables, wheat bread, and other healthful options. However, due to the nature of convenience stores, residents expressed the food landscape in East County is still limiting and does not offer foods that meet cultural or dietary needs.

One specific limitation identified was the perception of cumbersome state and county regulations that limit current food stores from expanding and new food stores to open. Zoning and fire code restrictions were called out as specific barriers for store owners and residents sited an incident where the cost of adhering to regulations was so burdensome the store owner was unable to complete the expansion. More information should be gathered to understand how the County can encourage food retail expansion and/or development in food deserts while continuing to adhere to necessary safety and development restrictions.

Prices in the East County convenience stores are consistently higher than grocery stores surveyed. Residents overwhelmingly preferred to shop at Bellingham stores because of greater selection and price considerations. Trip-chaining was also mentioned as commonplace along with sharing rides or running errands for friends and family.

While the literature suggests that opening a grocery store in a food desert may not have an immediate impact on diet, BMI, or other health outcomes, it will significantly improve resident access to healthy food. In addition, East County residents are interested in supporting a local, neighborhood grocer that offers fresh and local produce and a small variety of other items that supports their cultural and dietary needs. Ultimately, this assessment was not completed to search for a strategy to reduce rates of obesity in East County. This report is designed to facilitate a strategy to empower community around a need to access affordable, healthy foods - and the other impacts economic development could have on East County. This report is can be a resource for promoting healthy and equitable food access throughout East County and all of Whatcom County.

## Recommendations

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In 2013, Lina Walkinshaw proposed recommendations for moving forward with improving the food landscape of East County. The majority of those recommendations still ring true to today. While many have been addressed to some extent, there are still opportunities for growth and investment. Below is a combination of recommendations from the 2013 assessment as well new recommendations and next steps brought forth for consideration from the current assessment.

### *Support the East Whatcom Community in improving healthy food access*

1. WCHD and FCFP to plan and implement the second Foothills Food Access Summit to update the Foothills Food Access Plan
2. Share report and findings with relevant stakeholders and partners

### *Support local and state policy to incentivize grocery store development in rural food deserts*

1. Explore zoning and/or code regulations that could be adapted to incentivize grocery retail in East County.

### *Engage current retailers to determine ways to increase business while meeting community needs and desires*

1. Facilitate conversations between convenience store managers and/or owners understand more about price variance and opportunities to improve the food landscape and invest in current retailers.
2. Promote use of local farm markets through awareness campaigns and/or marketing strategies.

## Limitations

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This assessment encountered a few major limitations: 1. Outreach for focus groups was limited and attendance was minimal, 2. Community survey relied on convenience sampling, 3. Census and ACS data is limited in rural, small population regions and was not able to be used, 4. the NEMS survey is limiting.

### *Outreach for Focus Groups*

Focus group outreach was not able to be conducted as broadly as was originally planned, and attendance suffered due to this. Four focus groups were scheduled, however only two were held due to lack of RSVPs for the other two focus groups. Marketing and outreach was not able to be conducted and participants were not able to be recruited due to timing of these events.

### *Community Survey relied on convenience sample*

The Community Survey was offered online and in person and paper copies were available throughout the East Whatcom Community. While community members did reach out to neighbors and send to relevant e-mail distribution lists, the sample of this survey was largely based on convenience. In addition, people who chose to answer this survey may be invested and aware of the challenges with their local food landscape and more willing to share their thoughts, struggles, and opinions. It is important this information is kept in mind when interpreting the results of the survey.

### *Census and ACS data is limited in rural areas*

The Census and ACS data was unable to be used for this assessment due to high margins of error for the small CDPs in East County. It will be important to update this data after the 2020 Census to provide a better understanding of who lives in East Whatcom and how the population has changed or grown over the past ten years.

### *NEMS Survey is limiting*

While it was important to be able to compare results of the NEMS survey from the 2013 assessment to the 2019 assessment, the survey itself is limiting. For example, it does not consider opportunities for assessing culturally appropriate foods or specific dietary needs (i.e. gluten free options). While it is possible to adapt the survey to get a better understanding of culturally appropriate food, it was determined that using the same NEMS criteria as the 2013 assessment would provide a better understanding of the food landscape.

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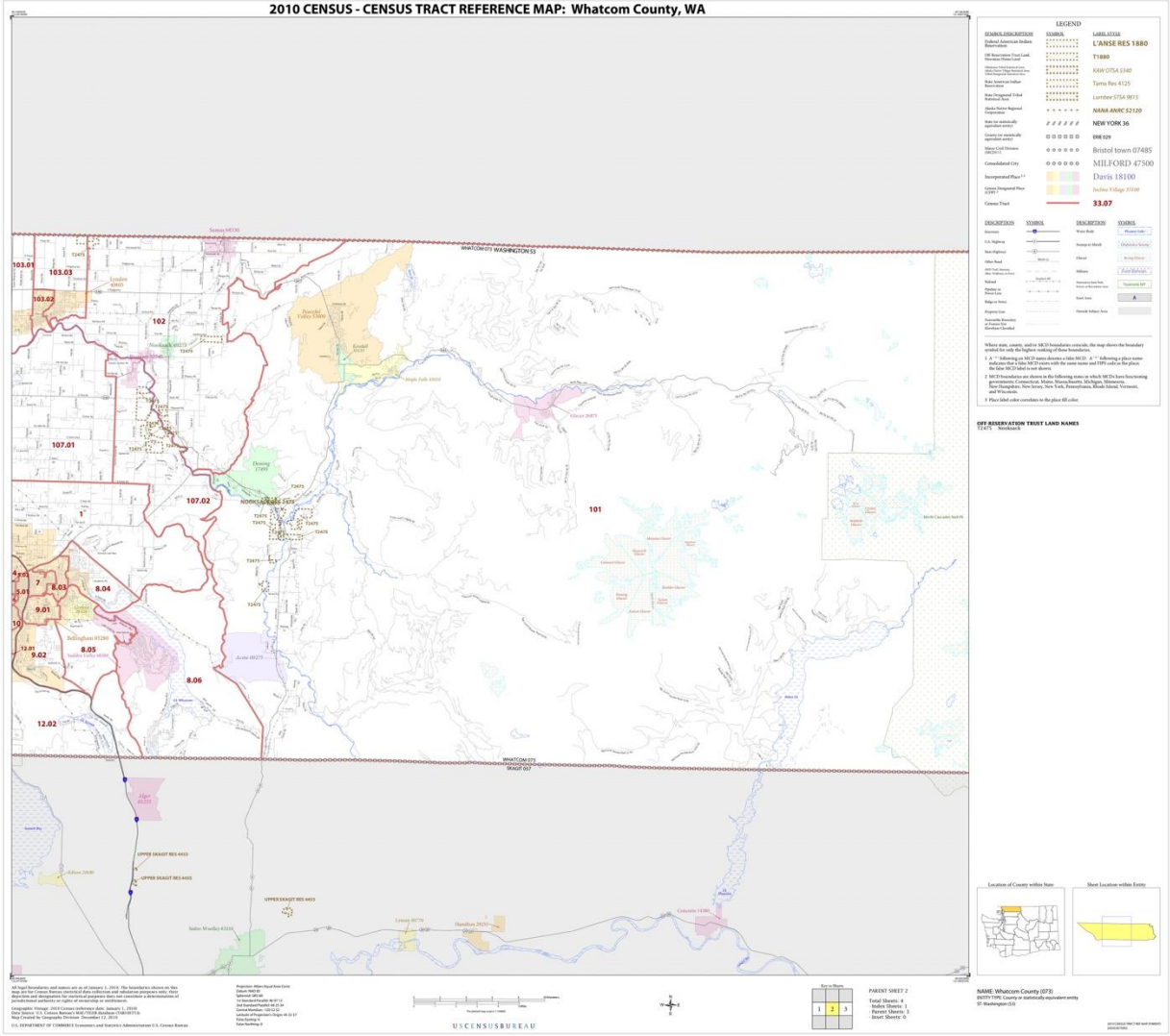
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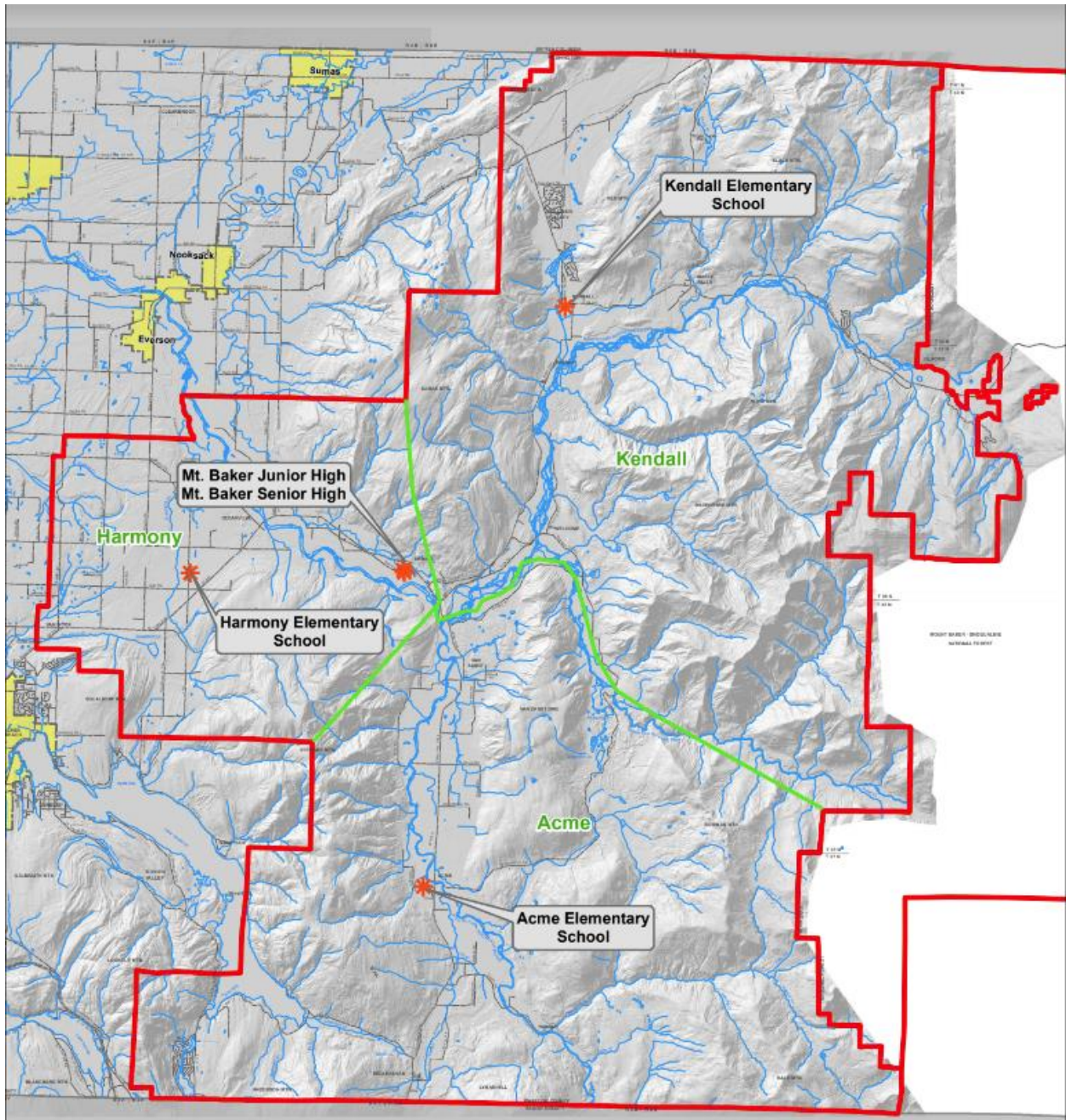
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# Appendices

## A. US Census Tract 101



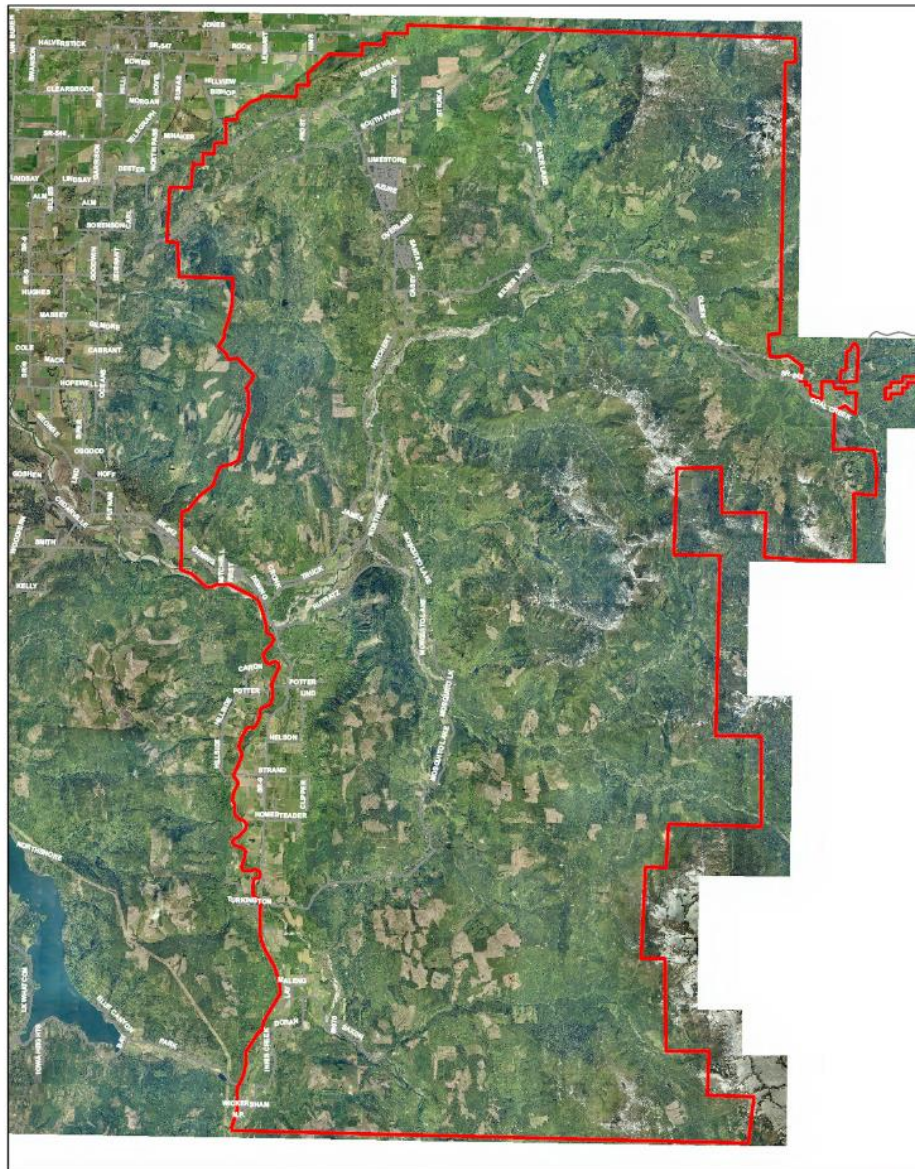
## B. Mt. Baker School District Boundaries






### C. East Whatcom Regional Resource Center Service Boundaries

APPROVED 01172013



**East Whatcom  
Region**

 East Whatcom  
Region Boundary

USE OF MAPS AND DATA IS SOLELY FOR INFORMATIONAL PURPOSES. THE STATE OF NEW JERSEY DOES NOT WARRANT THE ACCURACY OF THE DATA OR THE RESULTS OF ANY ANALYSIS. THE STATE OF NEW JERSEY DOES NOT WARRANT THE ACCURACY OF THE DATA OR THE RESULTS OF ANY ANALYSIS. THE STATE OF NEW JERSEY DOES NOT WARRANT THE ACCURACY OF THE DATA OR THE RESULTS OF ANY ANALYSIS.

0 0.45 0.9 1.8 2.7 3.6 Miles



## Appendix D. East Whatcom Community Survey

# East Whatcom Community Food Survey

As part of the Foothills Community Food Partnership Landscape Assessment, the Community Food Survey will assess the community's perceptions and desires for the food landscape. Please return completed surveys to the Deming Library, North Fork Library, Drop Box outside the East Whatcom Regional Resource Center, or contact Aly Robinson, [arobinso@whatcomcounty.us](mailto:arobinso@whatcomcounty.us)

### 1. What community do you live in?

*Mark only one*

- Columbia Valley (Kendall, Peaceful Valley, Paradise Valley)
- Maple Falls
- Glacier
- Acme
- Van Zandt
- Deming
- Nugents Corner
- Other:

### 2. How old are you?

*Mark only one*

- 0-16
- 16-35
- 35-60
- 60 or older

### 3. Do you get the groceries for your household most of the time?

*Mark only one*

- Yes
- No

### 4. Where does your household usually get groceries? Please list store name and location.

*Up to three (3) answers*

### 5. Why does your household get groceries at these places?

*Mark all that apply*

- Convenience of location

- Selection of food
- Affordability of food
- The store is part of my community
- Other:

**6. If you had the choice to get groceries anywhere, where would you choose? Please list store name and location.**

*Up to three (3) answers*

**7. Why do you prefer that place?**

*Check all that apply*

- Convenience of location
- Selection of food
- Affordability of food
- The store is part of my community
- Other:

**8. How often does your household get groceries?**

*Mark only one*

- 2 or more times a week
- 1 time a week
- 1 time a month
- Less than 1 time a month
- Other:

**9. Do you think that food is accessible, convenient, and affordable in your community?**

*Mark only one*

- Yes
- No
- Somewhat
- Other:

**10. Do you or your neighbors struggle with accessing healthy, affordable food?**

*Mark only one*

- Yes
- No
- Somewhat

**11. If you answered “yes” or “somewhat” above, what are some reasons you or your neighbors might have trouble?**

*Mark all that apply*

- Transportation
- Money
- Convenience (or distance to healthy food)
- Knowledge of healthy food
- The food in this community does not meet our cultural needs
- Other:

**Please select how much the following applies to you**

(0 = not at all like me; 1= somewhat like me; 2 = yes this sounds like me)

	0 (Not at all Like me)	1 (Somewhat like me)	2 (Yes this sounds like me)
12. In the past 6 months, my household had no problems or anxiety about consistently getting adequate food.			
13. In the past 6 months, my household had problems or anxiety about getting adequate food, but the quality, variety, and amount of food was still okay.			
14. In the past 6 months, members of my household had to decrease the quality, variety, and desirability of our diets, but the amount of food and number of meals we had was pretty usual.			
15. In the past 6 months, the number of meals of one or more household members was less than usual and the amount of food was less			

than usual because the household didn't have enough money or other resources for food.			
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**Grocery in East County**

**16. Would having a store closer to your home help you or your neighbors with some of the things that make it hard to get groceries?**

*Mark only one*

- Yes
- No
- It depends

**17. If there were a new place to get groceries in East County, what location would be best for you and your neighbors? Mark on the map below**



**18. If there were a new retail space in East County, what would you like to see there?**

*Mark all that apply*

- Full service grocery store
- Partial grocery store (co-located with other goods)
- Medical clinic
- Pharmacy
- Other (list as many as you want):

**19. Would you shop at this retail space?**

*Mark only one*

- Yes

- No
- Maybe

**20. Why or why not?**

**21. What would you need in order to shop at this retail space?**

*Mark all that apply.*

- Bus or transit accessibility
- Pharmacy
- Low-cost groceries
- Acceptance of EBT
- Organic or diet-specific foods
- Other (list as many as you want):

## Appendix E. Focus Group Script

Goal: to assess where East County residents are getting their food and if new grocery retail were to come to East County, what would the community want it to look like

Thank you for coming to our focus group. Today, we are going to discuss food insecurity in your community, your personal shopping preferences, and your thoughts about food retail. Before we begin, we want to acknowledge that everyone's thoughts matter. Please be respectful of others' perspectives, and recognize that everyone's experience is different.

First, we'll define food insecurity. Food insecurity is the state of being without reliable access to a sufficient amount of affordable, nutritious food. 40 million households in the U.S. are considered "food insecure". We know that many families in Whatcom County have a hard time getting to healthy, affordable food. We're going to talk about people in this community who may have a hard time and try to think of ways that we can make it easier to get healthy, affordable food.

- In general, why do you think food insecurity might be a problem?
- Who do you think is most affected by food insecurity?
- Do you think that food is available, accessible, and affordable in this community?
  - Can you tell us more about that?
- Do you or your neighbors have a hard time accessing healthy food?
  - What are some reasons you or your neighbors might have a hard time?
- How do you and your neighbors get healthy, affordable food?
- What are some things that would help those who are having a tough time accessing healthy food?
- What does your community do to address food insecurity?

Now, we'll ask about your personal preferences and input in your community's development

- If you could shop anywhere to get your groceries, where would you go? Why do you prefer this place?
- Where do you usually get your groceries? If this isn't your top choice for groceries, why do you choose to shop here?
  1. How often do you shop for food?
  2. How do access to transportation and the costs of food affect your access to healthy, affordable food?
- If there were new grocery retail development in East County, what location would be best for you and your neighbors? (Map)
- If land in Kendall/Peaceful Valley were developed for retail, what would you like to see there? (example: full service grocery, partial grocery, pharmacy, medical clinic, etc.)
- Would you shop at this retail space? Why or why not?
- What would you need from this development in order to shop there? (example: easy transit access, organic foods, EBT acceptance, etc.)

This concludes our focus group. Thank you for your participation. If you are interested in staying informed about the development of a food retailer in your community, please leave your contact information on the sign-in sheet.

If you have any remaining questions, comments, or concerns, please let us know. Our contact information is located on the sign-in table.